

**PRESIDENT'S SECRETARIAT
(LIBRARY)**

Accr No. Class No.....

The book should be returned on or before the date
last stamped below.

SECRET.

ARMY DEPARTMENT
SUMMARY
OF
PRINCIPAL EVENTS AND MEASURES

DURING THE

VICEROYALTY OF LORD MINTO
FROM NOVEMBER 1905 TO NOVEMBER 1910.



SIMLA:
GOVERNMENT CENTRAL BRANCH PRESS.
1910.

TABLE OF CONTENTS.

LIST OF OFFICERS OF THE DEPARTMENT.

		Page.
CHAPTER		
	I.—Army Administration and Finance	1
„	II.—Moral and Material Progress	8
„	III.—Measures affecting the organisation of the Army	14
„	IV.—Progress in mobilisation and defence requirements	23
„	V.—Field and other Active operations	34
„	VI.—Distribution of the Army	45
„	VII.—Military Situation on the North-West Frontier	51
„	VIII.—Military Intelligence	55
„	IX.—Progress in Military Communications	66
„	X.—Ordnance Department	69
„	XI.—Medical and Sanitary	75
„	XII.—Military Works	79
„	XIII.—Remount Department	83
„	XIV.—Miscellaneous	85
„	XV.—The Royal Indian Marine	91
APPENDIX A	... ... ...	108
„ B	... ... ...	109
INDEX	... ... ...	112

Member of Council in charge of the Military Department, Government of India.

The HON'BLE MAJOR-GENERAL C. H. SCOTT, C.B., R.A.

Officers of the Military Department, Government of India.

18th November 1905 to 18th March 1906.

Secretary.

MAJOR-GENERAL E. DEBRATH, C.B., C.I.E.

Deputy Secretaries.

COLONEL H. B. WATKIS.

LIEUTENANT-COLONEL H. T. KENNY.

Assistant Secretaries.

MAJOR B. HOLLOWAY.

MAJOR F. J. MOBERLY, D.S.O. (on special duty).

CAPTAIN H. CHANDLER.

MAJOR R. F. G. BOND, R.E.

MAJOR H. H. F. TURNER (additional, temporary).

Accountant-General.

COLONEL W. R. LEG. ANDERSON, C.B. (on furlough).

COLONEL H. F. S. RAMSDEN (Offg.).

Deputy Accountant-General.

MAJOR W. A. M. BRUCE.

Assistant Accountant-General.

E. O'B. SMITH, Esq.

Member of Council in charge of the Department of Military Supply, Government of India.

The HON'BLE MAJOR-GENERAL C. H. SCOTT, C.B., R.A.

Officers of the Department of Military Supply, Government of India.

19th March 1906 to 31st March 1909.

Secretary.

COLONEL E. W. S. K. MACONCHY, D.S.O.

Deputy Secretaries.

LIEUTENANT-COLONEL H. T. KENNY, vacated	...	31st Dec. 1906.
MAJOR G. A. ROBERTSON (on furlough)	...	1st Jan. 1907.
MAJOR W. H. F. BASEVI (officiating)	...	8th February 1908

Assistant Secretaries.

MAJOR R. F. G. BOND, R.E., vacated	...	30th June 1908.
MAJOR H. F. THUILLIER, R.E., joined	...	1st July 1908.

ARMY DEPARTMENT.

Secretaries.

MAJOR-GENERAL A. W. L. BAYLY, C.B., C.S.I., D.S.O., joined *19th March 1906.*
combined leave *ex India*, 8 months.

LIEUTENANT-COLONEL A. H. BINGLEY, (officiating Secretary) reverted, *7th July 1907.* *7th Nov. 1906.*

MAJOR-GENERAL A. W. L. BAYLY, C.B., C.S.I., D.S.O., leave *7th July 1907.*
ex India from 22nd November 1909 to 18th March 1909.

MAJOR-GENERAL H. M. P. HAWKES, C.B., (officiating) . . . *23rd Nov. 1908.*

MAJOR-GENERAL SIR R. I. SCALLON, K.C.I.E., C.B., D.S.O. . . *1st April 1909.*

Deputy Secretaries.

LIEUTENANT-COLONEL A. H. BINGLEY, joined *19th March 1906.*
" " " " (offg. Secy.) (reverted 7th July 1907).

MAJOR F. A. HOUGHTON (Offg. Dy. Secy.) *7th Nov. 1906.*
" " " vacated 7th July 1907 : : :

LIEUTENANT-COLONEL A. H. BINGLEY (on special duty *7th July 1907.*
from 14th July 1908).

LIEUTENANT-COLONEL H. HUDSON, C.I.E. (Offg.) *14th July 1908.*

COLONEL E. W. S. K. MACONCHY, C.I.E., D.S.O.
leave *ex India*, 8 months, 1st March 1910. : : : } *1st April 1909.*

A. B. C. BT. COLONEL J. M. STEWART (Offg.) *2nd March 1910.*

Assistant Secretaries.

C. H. WEST, Esq., C.I.E., joined *19th March 1906.*
combined leave *ex India*, 15 months, 21st March 1907
(rejoined 20th June 1908).

BT. MAJOR A. H. BRIDGES (Offg.) *21st March 1907.*
" " " vacated : : : : . *6th July 1907.*

MAJOR F. A. HOUGHTON (Offg.) *7th July 1907.*
" " " vacated : : : : . *17th Sept. 1907.*

CAPTAIN H. F. COOKE (Offg.) *18th Sept. 1907.*
" " " vacated : : : : . *19th June 1908.*

C. H. WEST, Esq., C.I.E., retired *22nd April 1909.*

MAJOR A. H. O. SPENCE *22nd April 1909.*

MAJOR H. F. COOKE *1st April 1909.*
leave *ex India* from 24th August 1909 to 24th November 1909.

CAPTAIN A. M. KETTLEWELL *19th April 1909.*
" " " vacated : : : : . *15th Sept. 1909.*

" H. N. YOUNG *16th Sept. 1909.*

" C. W. MoG. COMPTON *16th Sept. 1909.*

" " " vacated : : : : . *23rd Nov. 1909.*

CHAPTER I.

ARMY ADMINISTRATION AND FINANCE.

(1) ABOLITION OF THE MILITARY DEPARTMENT AND CHANGES IN ARMY ADMINISTRATION CONSEQUENT THEREON.

The revision of the system of Army Administration, which was in abeyance pending the arrival of Lord Minto, was resumed on his assuming office as Viceroy; and, under his directions, details of the scheme, the main principles of which had been elaborated during the Viceroyalty of Lord Curzon, were finally worked out. These, with some modifications, duly received the assent of His Majesty's Government; and with effect from the 19th March 1906, the Military Department of the Government of India, after an existence of over 120 years, was abolished, the administrative control of the Army in India being simultaneously distributed between two new Departments, *viz.*, the Army Department and the Department of Military Supply. The former was placed in charge of His Excellency the Commander-in-Chief, thus making him directly responsible, as Member of Council in charge of the Army Department, to the Governor-General in Council for the administration of the Army in India. The staff of the Army Department was fixed at one Secretary with rank of Major-General, one Deputy Secretary with rank of Lieutenant Colonel, and one Assistant Secretary.

Simultaneously the Finance Department (Military Finance) was created as a branch of the Finance Department, but was placed in close co-ordination with the Army Department in order that it might the better exercise that control over Army expenditure previously exercised by the Finance Department. The Military Accounts Department, hitherto under the control of the Military Department, was now placed under the general direction of the newly created Military Finance Branch of the Finance Department. As a further important step towards effective administration, the Division of the Chief of the Staff was also created, with a Chief of the Staff at its head, who, under the orders of the Commander-in-Chief, was responsible to him for all matters of policy affecting the army, for its higher training, for mobilisation and war organisation, etc. The Division of the Chief of the Staff, together with the following departments of the Army Staff, *viz.*, the Adjutant General's Department, the Quarter Master General's Department, and the Departments of the Principal Medical Officer, His Majesty's Forces in India, and the Military Secretary to the Commander-in-Chief were, with effect from the 19th March 1906, constituted Divisions of the Army Department, in order to attain co-ordination and continuity of policy and purpose in Army administration.

The Department of Military Supply, under the direction of a Member of Council, was charged with the following branches of Army and Marine Administration :—

- (i) the control of army contracts;
- (ii) the purchase of stores, ordnance and remounts;
- (iii) the custody and control of all stores, ordnance and remounts not expressly assigned by the Government of India to the Army Department;

- (iv) the management of military works;
- (v) the clothing and manufacturing departments;
- (vi) the Indian Medical Service;
- (vii) the Royal Indian Marine;
- (viii) Marine surveys and dangers to navigation (corresponding with the hydrographic section of the Admiralty).

In order to give effect to the above changes in system, the Rules of Business were, in accordance with Mr. Morley's despatch No. 18, dated the 9th February 1906, reconsidered and revised, and the necessary changes made therein, to meet the needs of the reformed administrative machinery.

The system thus introduced continued unchanged for a year, but it was from the first recognised that the revised machinery of Army administration might need modification in various directions, as knowledge was gained by its working. The experience of a year having shown that the newly created Finance Department (Military Finance) had exercised a marked control over Army expenditure, it was considered that a further step towards effective and economical administration would be gained by relieving the Secretary in the Army Department of financial responsibility, and appointing the Secretary in the Finance Department (Military Finance) as Joint Secretary in the Army Department for financial matters. It was considered that by this division of responsibility the Secretary in the Army Department would be the better able to deal with Army affairs from the administrative point of view, while financial control would, at the same time, be rendered more effective by being solely in the hands of a financial expert.

The sanction of the Secretary of State having been accorded, the work of the Army Department was classified under three heads, *viz.*—

- (a) purely administrative;
- (b) purely financial;
- (c) both administrative and financial.

Army business falling under class (a) is accordingly dealt with exclusively by the Secretary A (Administration), that under (b), exclusively by the Secretary F (Finance), and that under (c), jointly by Secretary (A.) and Secretary (F.). In order, however, to ensure due co-ordination, orders on questions coming under class (a) are seen in draft before issue by Secretary (F.), and those under class (b) are similarly seen by Secretary (A.).

In a little over two years from the inception of the new system it became evident that the existence of the Department of Military Supply as a separate organisation was not justified, in view of the expense involved in its maintenance and of the dual control in Army administration which it perpetuated. Accordingly, in the autumn of 1908, the Secretary of State's sanction was requested to its abolition, and to the business transacted in it being transferred to the Army Department. Lord Morley's sanction was received early in 1909, and with effect from the 1st April 1909 the administrative control of the Army in India, which was previously divided between the Army Department and the Department of Military Supply, was centralised in

the former Department by the abolition of the latter. Under this arrangement the work of the Departments which were formerly under the control of the Department of Military Supply has been distributed as follows :—

Ordnance Department	...	... Converted into a Division of Army Head Quarters.
Military Works Services	...	... Converted into a Division of Army Head Quarters.
Army Clothing Department	...	Transferred to Adjutant General's Division.
Army Remount Department	...	Transferred to Quarter Master General's Division.
Marine Department. Questions connected with Medical Stores, Indian Medical Service, and Indian Sub-ordinate Medical Department.		Administered by Army Department.

The Staff of the Army Department as thus enlarged, was fixed at one Secretary, one Deputy Secretary and three Assistant Secretaries.

In order to differentiate the several Divisions of the Army Department more clearly from the territorial divisions of the Army, the term "Division" as applied to the former has been abandoned and they are now known as "Branches" of the Army Department.

(2) APPOINTMENT OF AN INSPECTOR-GENERAL OF ORDNANCE FACTORIES.

This measure, which was sanctioned by the Secretary of State during Lord Curzon's Viceroyalty, in order to ensure more efficient and economical administration of the Ordnance factories, was given effect to in January 1906. His office was subsequently (1908-09) removed from Simla to Naini Tal. In connection with the reorganisation of the Ordnance Department—see (4)—it has been proposed to alter the designation of this officer to Director of Ordnance Factories.

(3) APPOINTMENT OF A CHIEF CIVIL ENGINEER IN THE OFFICE OF THE INSPECTOR-GENERAL OF ORDNANCE FACTORIES.

Sanction has been accorded to the appointment of a Chief Civil Engineer in the office of the Inspector-General of Ordnance Factories on a salary of Rs. 1,200—60—1,500 per mensem, to advise and assist in all questions relating to design and manufacture which are dealt with in the mechanical branch of that office.

(4) REORGANISATION OF THE ORDNANCE DEPARTMENT IN INDIA.

In consequence of the increased care in manufacture demanded by the complexity of modern war material, the changes in the distribution of troops and their organisation, and the increased facilities for communication, the Director-General of Ordnance in 1906 submitted a scheme for the reorganisation of the Ordnance Department in India. The more important of the proposals were the improvement of the administration of the factories and increase of the supervising staff, the creation of an independent inspection department and the reorganisation of the Ordnance Stores branch. The improvement of the

conditions of service of the civil and military subordinate staff, and of the native labour in factories, also formed features of the scheme, which was estimated to involve an annual expenditure of Rs. 3,30,000. These proposals were exhaustively considered by the Government of India, and the advisability of a reform in the existing machinery of Ordnance administration was recognised ; but in view of the great expense involved in the proposals submitted by the Director-General of Ordnance it was decided in 1908-09 to postpone them till the financial position admitted of their further consideration. It was subsequently decided to proceed with a modified and less expensive scheme which would remedy the more urgent defects in the existing system. These were that manufacturing officers were also employed to inspect and pass their own outturn, that the grouping of ordnance stores and establishments was not in accordance with the location of troops, that much needless correspondence and delay were caused by a want of due co-ordination, and that the rates of pay generally were out of date. To remedy these defects a scheme has recently (August 1910) been forwarded for sanction to the Secretary of State, which provides for the creation of an independent inspection branch under a Director of Ordnance Inspection, with a suitable staff, which would be responsible for the inspection of all stores, including those in the hands of troops. In order to carry this out at a minimum extra cost, it is also proposed to reduce the number of Inspectors General of Ordnance from two to one, this appointment retained being re-designated "Director of Ordnance Stores," the officer being made responsible for all stores, the storage of which would to some extent be concentrated. Further, in order to bring Ordnance officers into closer touch with General Officers Commanding Divisions, it is proposed to create a grade of Chief Ordnance officers of divisions who will be on the staff of Divisional Generals, and be given powers which will relieve the Director of Ordnance Stores to a material extent. The present Inspector General of Ordnance Factories is to be styled Director of Ordnance Factories, and a Deputy Director of Factories is to replace the present Assistant Inspector General of Ordnance Factories. Various minor alterations as to the system of grading, rates of pay and allowances, etc., have also been proposed ; and the whole scheme is estimated to eventually involve an extra annual cost of Rs. 61,000 and about Rs. 50,000 for buildings. There is a further proposal to the Secretary of State to institute charge allowances to warrant officers of the Department varying from Rs. 30 to Rs. 120 per mensem, which is estimated to cost Rs. 40,000. Pending sanction of the Secretary of State, funds have been provided in the estimates of 1910-11.

(5) SYSTEM OF ACCOUNTS IN FACTORIES.

It has long been recognised that changes were necessary in the existing method of compiling the accounts of the Ordnance factories in this country, and it was accordingly decided in 1906-07 to appoint a committee to consider the question. The Committee, in which were included War Office experts deputed from England for the purpose, assembled in October 1907 to consider the question of revising the existing system of compiling the accounts of the Ordnance factories in India. Their report, which dealt exhaustively with the whole question, was duly considered by the Government of India and sent Home with their views. These have now received the assent of the Secretary of State, and orders for the working of the new system will shortly be issued.

(6) ARMY CLOTHING DEPARTMENT.

With the sanction of the Secretary of State, an officer was added in 1906 to the staff of the Army Clothing Department in order to provide a leave reserve to fill the place of absentees.

(7) REUNIFICATION OF THE SUPPLY AND TRANSPORT CORPS.

Under the arrangement obtaining in 1905-06 the main portion of the Supply and Transport Corps was under His Excellency the Commander-in-Chief, the Contracts and Registration Branch being under the Department of Military Supply. This dual control being considered disadvantageous, the Contracts and Registration Branch was transferred to the Commander-in-Chief with effect from 17th December 1906, the Quarter-Master General in India being made responsible to His Excellency for its entire administration and working. Provisional arrangements were introduced on the 1st April 1907 and reported to the Secretary of State for approval. Certain details regarding the superior administrative staff were left for decision later. Proposals for the latter were submitted to the Secretary of State in despatches Nos. 58 and 12, dated 13th June 1907 and 23rd January 1908, respectively, the main feature of which was the abolition of the appointment of Inspector of Supply and Transport on the Army Head Quarters staff. The Secretary of State's final sanction to the proposals was communicated in his telegram of the 31st March 1908. The reunification of the Supply and Transport Corps has resulted in a saving of several lakhs.

(8) FARMS.

The management of Military Grass and Dairy Farms was incorporated with the administration of the Supply and Transport Corps with effect from 1st April 1909, with the approval of the Secretary of State for India.

(9) ARMY REMOUNT DEPARTMENT.

The arrangements obtaining up to 1906-07, under which remounts were purchased at the Calcutta Remount Depôt by the Superintendents of the Saharanpur and Hapur depôts, who had to proceed to Calcutta for the purpose, having been found unworkable, it was decided in that year to revive the appointment of Superintendent, Calcutta Remount Depôt, which had been abolished in 1903 on the reorganisation of the Army Remount Department. Further, in view of the importance of horse-breeding in the Deccan, it was decided to appoint a Superintendent to the sole charge of that circle, heretofore included in the control of the Superintendent of the Ahmednagar Remount Depôt. As a set-off against the extra expense involved in the above measures, the number of probationers in the Army Remount Department was reduced from three to two.

(10) REORGANISATION OF THE JUDGE ADVOCATE-GENERAL'S DEPARTMENT.

The Judge Advocate-General's Department was reorganised by the abolition of Assistant Judge Advocate Generals of the Northern and Southern Armies and Burma Division, it being considered by Lord Kitchener that the work of the department could be carried on efficiently with a smaller cadre of officers. This measure was estimated to produce a saving of about Rs. 40,000

per annum, the reduction taking effect gradually as vacancies occurred. Experience has however shown that the reduction was too great, and the Secretary of State has been asked (September 1910) to increase the cadre by one Assistant Judge Advocate General, thus reducing the anticipated savings to about Rs. 26,000.

(11) ABOLITION OF COMMANDS.

In connection with the reorganisation of the Army in India a further step was taken on 1st June 1907 by the abolition of the former Commands (Northern, Western and Eastern), and the organisation of the Army in two great divisions known as the Northern and Southern Armies, respectively. The Northern Army comprises the Peshawar, Rawal Pindi, Lahore, Meerut, and Lucknow Divisions, and the three independent Frontier Brigades of Kohat, Bannu, and Derajat. The Southern Army comprises the Quetta, Mhow, Poona, and Secunderabad Divisions, with the garrisons of Burma and Aden. At the same time General Officers Commanding Divisions were entrusted with the administrative powers formerly exercised by the Lieutenant-Generals of Commands and placed in direct communication with Army Head Quarters. Army Commanders were made responsible for the efficiency of their Divisions for war, and, being relieved of administrative work, were left free to devote themselves to the training, instruction, and inspection of the troops. The Army Departmental services were also provisionally reorganised to conform to the new system ; and a despatch will shortly be sent home recommending the permanent arrangements considered most suitable. The abolition of Commands, and consequent departmental changes, have resulted in an economy of several lakhs.

(12) DIVISION OF THE GARHWAL BRIGADE INTO TWO BRIGADES AND AMALGAMATION OF THE MADRAS AND SOUTHERN BRIGADES.

With the approval of the Secretary of State for India the Garhwal Brigade, which was found to be unduly large and inconvenient, was, early in 1910, divided into two brigades, with head quarters at Lansdowne for the Garhwal Brigade and at Dehra Dun for the Dehra Dun Brigade, the necessary staff being found by the amalgamation of the Madras and Southern Brigades, the amalgamated Brigade retaining the designation of the Southern Brigade with headquarters at Fort St. George, Madras.

(13) FORMATION OF A GENERAL STAFF.

The question of the formation of a General Staff for India, which has been under consideration since October 1907, entered on a new phase in April 1909, owing to the receipt of a despatch from the Secretary of State forwarding certain proposals with regard to the formation of an Imperial General Staff. These received consideration, and a reply was sent to the Secretary of State, who, at the same time, was asked to sanction the formation of a General Staff for India on the lines accepted. The final stage of the above measure was entered upon when the Secretary of State in a despatch, dated 1st October 1909 (No. 117), definitely authorised the Indian Government to proceed with the scheme "on the lines laid down by His Majesty's Government for an Imperial General Staff." After considerable discussion as to what modifications in detail were required by Indian conditions, a special India Army Order was

issued on the 19th March 1910, which brought into being a General Staff for the Army in India. Under this order the Chief of the Staff at Army Head Quarters became the Chief of the General Staff, and the General Staff for the Army in India was grouped into two principal divisions, *viz.*, the General Staff at Army Head Quarters, and the General Staff in Armies, Divisions, etc. The functions of the former are to advise on the Strategical Distribution of the Army, to supervise the education of officers, and the training and preparation of the Army for war, to study military schemes, offensive and defensive, to collect and collate military intelligence, to direct the general policy in army matters and to secure continuity of action in the execution of that policy. The functions of the latter are to assist the officers on whose staff they are serving in promoting military efficiency, especially in regard to the education of the officers and the training of the troops, and to aid them in carrying out the policy prescribed by the General Staff at Head Quarters.

(14) ARMY EXPENDITURE.

Excluding Military works and Marine expenditure, which have been separately shown in the Chapters dealing with them, the total Army expenditure for the past five years has been as follows :—

		Rs.
1905-06	... { Budget 20,95,94,000	
	Actuals 21,15,01,656	
1906-07	... { Budget 21,36,59,000	
	Actuals 21,20,86,585	
1907-08	... { Budget 21,89,08,000	
	Actuals 20,04,31,031	
1908-09	... { Budget 21,56,01,000	
	Actuals 20,70,31,460	
1909-10	... { Budget 20,82,67,000	
	Actuals not yet known.	

The total army expenditure budgetted for in 1910-11 is Rs. 21,06,98,090.

CHAPTER II.
MORAL AND MATERIAL PROGRESS.

(15) PAY OF INSPECTORS OF ARMY SCHOOLS.

The rates of pay of Inspectors of Army Schools were increased, with effect from 11th October 1908, to the extent shewn below :—

		PER MENSEM.	
		Old rate.	New rate.
		Rs.	Rs.
Inspectors of less than 5 years' service as such	...	300	335
Inspectors of over 5 and less than 10 years' service as such	...	325	370

(16) PAY OF BRITISH OFFICERS.

The pay of Captains of the Indian Army was raised, with effect from 1st January 1909, from Rs. 374-1-6 to Rs. 400, per mensem, and that of subalterns from Rs. 225-12-0 to Rs. 280, per mensem.

With effect from 1st January 1909, the staff pay of Squadron and Double Company Commanders of Indian cavalry and infantry regiments was raised as shewn below :—

		PER MENSEM.	
		Old rate.	New rate.
		Rs.	Rs.
2nd Squadron Commanders	...	210	250
3rd and 4th Squadron Commanders	...	180	200
3rd and 4th Double Company Commanders	...	125	125

(17) STAFF SALARY OF ASSISTANT ADJUTANTS AND QUARTER MASTERS GENERAL ON THE INDIAN ESTABLISHMENT.

An increase has been sanctioned of Rs. 200, per mensem, (Rs. 500 to 700) to the Staff salary of Assistant Adjutants and Quarter Masters General on the Indian Establishment, except the Assistant Adjutants General for Royal Artillery and Royal Engineers at Army Head Quarters.

(18) ALLOWANCE TO UNATTACHED LIST OFFICERS.

The grant of an allowance of Rs. 100, per mensem, has been sanctioned to officers of the Unattached List attached to British regiments on their passing the higher standard in Hindustani.

(19) DETENTION ALLOWANCE.

The grant of detention allowance at Rs. 5, per diem, has been sanctioned to British regimental officers, and at the rate of Re. 1, per diem, for Native regimental officers, when detached from their stations on temporary duty under the orders of competent authority.

(20) EXTENSION OF THE PERIOD OF SERVICE OUT OF INDIA WHICH OFFICERS OF THE INDIAN ARMY ARE ALLOWED TO RECKON TOWARDS INDIAN PENSION.

The question of the desirability of extending the period of service out of India which officers of the Indian Army were allowed to reckon towards Indian pension was considered in 1906, and it was recommended that the limit of service before arrival in India, which was then two years, should be fixed at five years. This duly received the assent of His Majesty's Government, on the understanding that the Indian Government contributed towards the non-effective charges, the difference between British and Indian rates of pension for the excess period up to a maximum of three years. The concession, which applied to all officers of the Indian Army then on the effective list, came into force on the 1st January 1910.

(21) INSTITUTION OF AN ANNUAL GRADUATION OF RETIRING PENSIONS FOR OFFICERS OF THE INDIAN ARMY.

In 1908 the Secretary of State for India forwarded, for the consideration of the Government of India, as to its applicability to the Indian Army of the principles involved, a report by a Committee, held in England in May of that year, regarding the promotion and retirement of officers of the British Army. The only point in this report which the Government of India considered might be of advantage to the Indian Army was the institution of an annual graduation of retiring pensions. The Commander-in-Chief suggested a certain scale, commencing with £200 at 18 years up to £700 at 32 years' service; but the Government of India while putting it before the Secretary of State, were unable to recommend it until assured that the cost would not be materially greater than the existing scale. The Secretary of State, in assuring the Government of India on this point, sanctioned, with slight modifications in the intermediate rates, their introduction, and they were applied to the Indian Army with effect from the 1st February 1910.

(22) CLOTHING OF BRITISH TROOPS.

The introduction of a system of a cash allowance in lieu of issues of personal clothing in kind to British troops in India, was sanctioned with effect from 1st April 1909.

The system, with the exception of a few modifications rendered necessary by conditions of Indian service, follows that now in force in the British Army serving at Home and in the Colonies.

(23) FURLough TO BRITISH SOLDIERS IN INDIA.

With a view of increasing the furlough facilities of British soldiers serving in India, the Commander-in-Chief recommended that the following furloughs be granted annually in addition to that already allowed by regulations:—

- (a) Furlough to 250 men, serving regimentally, on completion of two years' service in India on payment of £15 and certain other conditions.
- (b) *Free* furlough to 500 men (on similar terms to those in force for non-commissioned officers) below the rank of Corporal who have served abroad continuously for six years, provided they extend their service to complete 12 years, and have at least two years to serve on their original engagement after return from furlough.

Recommendation (a) has been approved by the Secretary of State, and 66 men took advantage of the concession during the trooping season 1908-09. The War Office declined to agree to proposal (b).

(24) ELECTRICAL INSTALLATIONS.

Electrical installations in the barracks and hospitals of British troops mainly at Fort William, Jhansi, Meerut, Attock, and Bareilly are in progress.

A special recommendation for electrical installations at Delhi has been sent to Secretary of State, owing to its unhealthiness.

The installation at the Staff College, Quetta is nearing completion and a regular supply is maintained : punkhas at the Station Hospital, Calcutta, have been replaced by fans, and the Meerut installation has been practically completed.

A detailed estimate for an installation for Cawnpore has been sanctioned by the Secretary of State and the stores have been ordered from England.

Revised approximate estimates for the electrification of the 16 stations considered by the Government of India to be in most urgent need of installations, have been submitted to the Secretary of State, who however raised certain objections thereto, and the scheme has accordingly been dropped.

(25) INVALIDING OF BRITISH SOLDIERS TO THE HILLS INSTEAD OF TO ENGLAND.

It was found that a large number of British soldiers were annually invalidated to England for ailments which did not permanently incapacitate them for further service in India. The expenditure caused thereby to Indian revenues was great, as, not only was the cost of passages for themselves involved, but also cost of passages and capitation and other charges for those sent out in their places. Accordingly, in 1907 the experiment was tried of sending such invalids to the hills during the winter, instead of sending them to England, and the experiment was repeated in the following years. The reports of all concerned being favourable, the system has been made a permanent arrangement, thereby saving a considerable sum to Indian revenues and retaining seasoned soldiers in India for their full period.

(26) IMPROVEMENT IN THE CONDITIONS OF SERVICE OF MILITARY HOSPITAL ASSISTANTS.

The conditions of service of hospital assistants in military employ have been improved by the grant to them of the following concessions :—

- (a) free passage when proceeding on or returning from leave for a period of not less than six months on reduced pay ;
- (b) pension under Civil Service Regulations ;
- (c) an annual allowance of Rs. 12 in aid of the provision and maintenance of cloth uniform ;
- (d) pony allowance of Rs. 12, a month, when at, proceeding to, or returning from, a camp of instruction, manœuvres or concentration.

With the sanction of the Secretary of State, the designation of " Military Hospital Assistant " has been changed to " Military Sub-Assistant Surgeon ".

(27) REVISED PENSION RULES FOR THE INDIAN ARMY.

In order to popularise service in the Indian Army and with a view to improving its efficiency, it was considered necessary to revise the pension rules for the Indian soldier. The approval of the Secretary of State was accordingly obtained in 1906-07 to the new rules, the effect of which generally is (*i*) to allow of the sowar or sepoy becoming eligible for a pension of Rs. 4, per mensem, on completing 18 years' service, instead of 21 years as heretofore; (*ii*) to give graduated pensions to native officers and non-commissioned officers up to a maximum of Rs. 50, per mensem, on completion of 32 years' service for native officers and of Rs. 7 and Rs. 9 after 21 and 24 years' service, respectively, for Naicks and Havildars or Dafadars.

An invalid pension was reintroduced so as to permit of native officers and soldiers held to be medically unfit for further service after 15 years, receiving— Sepoys Rs. 3, Naicks Rs. 4, Havildars or Dafadars Rs. 5, Jemadars Rs. 12 and higher ranks Rs. 24, per mensem.

In modification of the above revised pension rules which were sanctioned in 1907, the sanction of the Secretary of State was obtained in 1909 to the grant to Indian officers who voluntarily retire on completion of 18 years' service, of the maximum pension of the next lower rank to that held on retirement.

Sanction was also obtained to combatants who were summarily discharged being granted the special rate of pension admissible to combatants who are invalidated after 15 years' service.

(28) GRANT OF CONCESSIONS TO THE INDIAN ARMY.

The conditions of civil life in India having altered to an extent which made a career in the army less attractive than in civil walks of life, it became necessary to combat the waning popularity of military service among the classes from which the Indian army is recruited. The following concessions were therefore sanctioned by the Secretary of State with this object, and came into effect on the 1st October, 1906 :—

- (a) A further increase of kit money for recruits from Rs. 40 to Rs. 60 (Rs. 25 to Rs. 40 in the case of military railway companies), except for non-silladar cavalry, the two Bhil Corps, the Resident's Escort, Nepal, harbour and coast defence lascars, bullock drivers of heavy batteries and the lascars of the Indian Submarine Mining Corps.
- (b) An allowance to assist in the purchase of foot gear. This took the shape of an addition to the clothing allowance of Rs. 5, per annum, per non-commissioned officer and sepoy in all dismounted services.
- (c) Grant of free passages (up to 20 per cent) in excess of the authorised furlough percentage, to men of the Indian Army when located more than 800 miles from their recruiting centre, and granted short leave on urgent private affairs.
- (d) Free grass for Native Cavalry regiments on the march or at manœuvres.

(29) GRANT OF THE HONORARY RANK OF JEMADAR AND AN ENHANCED RATE OF PENSION TO DESERVING DAFADARS AND HAVILDARS OF INDIAN REGIMENTS WHO HAVE SERVED AS ENGLISH SCHOOLMASTERS AND ORDERLY ROOM CLERKS.

With a view to improving the prospects of the English teaching schoolmasters and the orderly room clerks in regiments of the Indian Army, the Government of India recommended, and the Secretary of State sanctioned, the grant of the honorary rank of jemadar, with a special pension of Rs. 15, per mensem, to all deserving dafadars and havildars holding those positions in Indian regiments, on their transfer to the pension establishment, provided they have completed 32 years' service and are recommended for the reward (India Army Order No. 589 of 1907).

(30) EXTENSION TO THE MILITARY HOSPITAL ASSISTANTS IN CIVIL EMPLOY OF THE CONCESSIONS SANCTIONED IN 1906 FOR MILITARY HOSPITAL ASSISTANTS IN MILITARY EMPLOY.

The following allowances and concessions originally authorised *vide* (26) for military hospital assistants in military employ have been extended to military hospital assistants in civil employ :—

- (i) Grant of free passage under paragraph 78 (d) and (f), Army Regulations, India, Volume X, when proceeding on, and returning from, leave on reduced pay for a period of not less than six months.
- (ii) Grant of pension under Article 474, Civil Service Regulations, instead of under Army Regulations, India.
- (iii) Grant of an annual allowance of Rs. 12 in aid of the provision and maintenance of cloth uniform.
- (iv) Grant of pony allowance at the rate of Rs. 12, a month, when at, proceeding to, or returning from, a camp of instruction, manœuvres or concentration.

With the sanction of the Secretary of State the designation of these ranks has been altered to "Civil Sub-Assistant Surgeons."

(31) INCREASED ALLOWANCES FOR MILITARY MEDICAL SUBORDINATES EMPLOYED IN MEDICAL STORE DEPOTS.

In order to improve the conditions of service in Medical Store depots, the monthly allowances of Senior Assistant Surgeons and Assistant Surgeons were increased from Rs. 60 and Rs. 30 to Rs. 150 and Rs. 50, a month, respectively. These allowances are in addition to pay of grade. Hospital assistants, who previously received only pay of grade, were granted a monthly allowance of 25 per cent, on their pay. These changes had effect from 24th June 1906.

(32) FURTHER CONCESSIONS TO THE INDIAN ARMY.

As a mark of Royal favour in commemoration of the fiftieth anniversary of the assumption of the Government of India by the Crown, the following concessions were sanctioned with effect from 1st January 1909. With the increases

of pay herein shown, the rates of pay obtaining in the Indian Army are as indicated in Appendix A. :—

Native Officers to receive pay at the rates laid down in Army Regulations, India, for the highest grades of their respective ranks.

Non-commissioned officers and men of silladar cavalry to receive an increase of Rs. 3, per mensem, to their pay, while those of non-silladar cavalry, artillery, sappers and miners, and infantry, an increase of Rs. 2, per mensem, to their pay.

Non-commissioned officers and men of all arms to get a free issue of firewood at 3 pounds, a day.

A bonus of one week's pay was granted to all employés of the Government of India whose pay was under Rs. 50, per mensem.

It has been decided that the increase of pay and the free firewood for cooking purposes granted to men with the colours by India Army Order No. 16 of 1909, should be granted to reservists when called up for training irrespective of whether they joined the reserve before or after 1st January 1909.

(33) INCREASE OF PAY OF TRANSPORT PERSONNEL.

His Excellency the Commander-in-Chief has represented that the low rates of pay of the ordinary transport personnel are injuriously affecting recruiting, the organised transport units alone being 900 under strength, and that unless their emoluments are improved the efficiency of the transport service must suffer. It has therefore been proposed, pending consideration of these representations, to increase the pay of the drivers, lance-naiks, and naiks of the transport personnel, including those serving with the equipment mules of Pioneer Batteries. The extra cost of the measure is estimated at Rs. 2,24,517 recurring, but it is anticipated that some part of it will be met by savings which will be effected in the maintenance of transport animals. The Secretary of State has accorded sanction to these proposals.

(34) INSTITUTION OF THE INDIAN DISTINGUISHED SERVICE MEDAL.

As the means were limited for adequately rewarding the services of Indian commissioned and non-commissioned officers and men of the Indian Regular Forces, including the Reserves of the Indian Army, Border Militia and Levies, Military Police, and Imperial Service Troops when employed under the Government of India, who have distinguished themselves in peace or on active service, the Viceroy recommended the institution of the "Indian Distinguished Service Medal." This was approved by His Majesty King Edward VII, *vide* Royal Warrant dated 28th June 1907 and Army Department Notification No. 671 of 1907.

(35) ORDER OF BRITISH INDIA.

A proposal is under consideration to increase the 2nd class and to institute a 3rd class of the Order, with the object of spreading the rewards more equally over the various ranks.

CHAPTER III.

MEASURES AFFECTING THE ORGANISATION OF THE ARMY.

(36) INCREASE OF BRITISH OFFICERS IN THE INDIAN ARMY.

In connection with Lord Kitchener's scheme for the preparation of the Army for war, it was represented that the number of British officers in the Indian army was quite inadequate to meet requirements in the event of mobilisation on a large scale, and it was proposed for the present to work towards a peace complement of 15 British officers with each regiment of Native cavalry and infantry as financial considerations permit. It is estimated that an addition of 470 officers will be required to effect this, and the Secretary of State for India accepted the necessity for an immediate preliminary increase of 350 officers.

(37) DISBANDMENT OF THE 77TH AND 78TH MOPLAHS.

It was decided to muster out the 77th and 78th Moplah Rifles which had been raised in 1900. In addition to the difficulty in obtaining Moplah recruits it was found that men of this class are unsuitable as soldiers. These two class regiments were accordingly disbanded with the approval of the Secretary of State, and two additional Gurkha battalions were raised in their place. The number of Gurkha battalions was thus increased to twenty.

(38) RAISING OF THE 2-7TH GURKHAS.

The battalion was raised by India Army Order No. 342 of 1907, and numbered the 2-7th by India Army Order No. 483 of 1907. It is one of the two additional Gurkha battalions sanctioned by the Secretary of State to be raised in place of 77th and 78th Moplah Rifles mustered out.

(39) RAISING OF THE 2-10TH GURKHAS.

An additional battalion of Gurkhas was raised by India Army Order No. 536 of 1908, and numbered the 2-10th Gurkha Rifles. This was effected by the 10th Gurkha Rifles being divided into two wings. The 10th Gurkhas at the time was a single battalion regiment localised in Burma. One wing was then recruited up to the full strength of a battalion, and became the 1st Battalion, 10th Gurkhas, still in Burma. The other wing was delocalised, completed to the strength of a full Battalion, and designated the 2nd Battalion, 10th Gurkhas. The latter, thus constituted, was the second of the two Gurkha battalions sanctioned by the Secretary of State to be raised in place of the 77th and 78th Moplah Rifles, mustered out.

(40) DELOCALISATION OF THE 9TH BHOPAL INFANTRY.

In 1905 the Secretary of State was asked to agree to the delocalisation of the 9th Bhopal Infantry for the following reasons :—

- (a) unwillingness of the officers of the battalion to serve permanently at so remote a station as Sehore ; and
- (b) to enable its efficiency to be raised by associating it for training with other units.

It was held that no political objections existed to the delocalisation provided the Paramount Power made suitable military arrangements for the protection of the Bhopal State ; and it was accordingly decided that a Native infantry battalion should ordinarily be stationed at Sehore.

The Secretary of State agreed in these views, and early in 1906 assented to delocalisation, remarking that due attention should be paid to the distribution and class composition of the battalions which might in future be sent to garrison Sehore.

(41) DELOCALISATION OF THE BURMA BATTALIONS.

This measure was sanctioned by the Secretary of State in his despatch No. 66, dated 19th April 1907, paragraph 6. So far only the 72nd Punjabis and the 2nd Battalion, 10th Gurkha Rifles have been delocalised, leaving 6 battalions in Burma still to be so dealt with. The date of their delocalisation depends on when the necessary funds become available ; but it is hoped that one or more may be delocalised during 1911-12.

(42) DELOCALISATION OF THE 1ST BATTALION, 8TH GURKHA RIFLES.

The 42nd, 43rd and 44th Gurkha Rifles were localised in Assam. The delocalisation of the 42nd and 43rd has already been carried out and it is proposed to delocalise the 44th (now the 1st Battalion, 8th Gurkha Rifles) at an early date.

(43) DELOCALISATION OF THE 124TH AND 126TH BALUCHISTAN INFANTRY.

It is proposed during the relief season 1910-11 to remove these battalions from Baluchistan, thus effecting a saving of some Rs. 20,000, per annum, on account of the local allowances drawn by the British Officers of these regiments.

(44) FORMATION OF AN ADDITIONAL INDIAN CAVALRY REGIMENT.

In his military despatch No. 85, dated 14th July, 1905, the Secretary of State approved of an additional regiment of silladar cavalry being raised, with the single squadrons attached to the Deoli and Erinpura Infantry as a nucleus, thus finding one of the two Indian Cavalry regiments required to complete the Field Army. Owing to lack of funds this measure could not be undertaken before, but provision was made in the budget of 1907-08 with a view to raising the new regiment in the autumn of that year. This provision was subsequently cancelled, as the raising of this regiment was one of the schedule measures which the Secretary of State excluded. A scheme has now been placed before the Secretary of State for utilising the single squadrons of the Deoli and Erinpura Infantry towards the organisation of a Corps d'Elite, with the object of affording suitable regimental employment for the members of the Imperial Cadet Corps. This scheme is being dealt with by the Foreign Department.

(45) MALWA AND MEYWAR BHIL CORPS.

With a view to providing funds to meet the cost of raising and maintaining the 106th Hazara Pioneers, it was proposed to convert these two Bhil Corps

into Military Police battalions and transfer them to the control of the Foreign Department. The Secretary of State was accordingly addressed, and, with his sanction, the Meywar Bhil Corps was converted into a Military Police battalion with effect from 1st April 1908. The Malwa Bhil Corps was similarly converted with effect from 1st June 1908.

(46) THE ADEN TROOP.

Since 1907, when, in pursuance of the policy of His Majesty's Government, the Aden Hinterland was evacuated, the question of the safety of the trade routes in the Hinterland has been forced into prominence, as it was from the first recognised that the subsidized chiefs could not be depended on to maintain order thereon. Accordingly, in 1908, the Resident submitted a scheme for reorganising the Aden troop, in order that it might be the better able to undertake the duty of patrolling the routes and ensuring their safety. The Government of India, however, thought that it might be preferable to reduce the troop to a mere escort of about 20 sowars for the Resident and to convert the rest of the troop into a tribal levy representative of all the local Arab tribes, to which the safety of the routes might be entrusted. The Resident and Bombay Government have, however, objected to this proposal on the grounds that the local Arab tribes have no fighting instincts or cohesion and that any action on the part of the tribal levy would lead to blood feuds. They have accordingly submitted a revised scheme for the reorganisation of the Aden troop, which is still under consideration.

(47) PARTIAL RECONSTITUTION OF THE 107TH, 121ST AND 128TH PIONEERS.

Proposals have recently (1910) been submitted to Government with a view to increasing the efficiency of these regiments and making them more homogeneous in their class composition.

(48) ADDITION OF 1,496 MEN TO INDIAN INFANTRY.

This scheme provides for the augmentation of certain Madras and Bombay Infantry Battalions to a total strength of 912 of all Indian ranks which obtains in Northern India regiments; and certain others to a strength of 832 of all Indian ranks. It was shown that, for mobilisation purposes, the regiments on the lower strengths were not able to take the field without unduly depleting their links from which they would have to be completed to field service strength, thus rendering the latter incapable of taking the field; and hence such augmentation was held to be most desirable for mobilisation purposes. The total number of men required to effect this was originally 3,976, of whom 2,320 were available from the reductions made in the strength of the ten locally recruited Madras Battalions to 600; and it was proposed to recruit 1,656 additional men. Of these 160 were added to the establishment when the 2-6th and 2-9th Gurkhas were raised in lieu of the disbanded 65th Carnatic Infantry and 71st Coorgs, leaving 1,496 men for the further augmentations proposed.

This proposal was put to the Secretary of State in 1906, and sanctioned by him in 1907; but owing to want of funds the measure has not yet been carried out. The cost of the addition of these 1,496 men was to be partially met by effecting savings in other directions, such as (1) the delocalisation of the two Baluchistan Regiments, (2) delocalisation of the Burma Infantry

(3) abolition of supernumeraries in certain native regiments, (4) abolition of certain classes of followers in regiments, (5) abolition of the recruit and "line-boys" in Madras and Bombay Infantry, and (6) reduction of the establishment of lascars in British units. Most of these savings have already been effected, and taking all the resulting economies into account the net extra cost was estimated at Rs. 9,60,000 initial, and Rs. 67,000 recurring.

It is probable however that an effort will now be made to provide funds to carry out this measure on the basis of increasing the strength of only certain regiments to 912, leaving the others for future consideration.

(49) GURKHA RESERVE FOR THE INDIAN ARMY.

When the Indian Army Reserve was first formed in 1888, it was made applicable to Gurkha battalions of the Indian army. Subsequently, the Nepal Durbar objected to the presence in Nepal of Gurkha reservists of the Indian army, and, as a result, the transfer of Gurkhas to the Reserve was discontinued, those already in it, who were living in Nepal, being given the option of returning to British territory or of being struck off the strength of the reserve. Reservists remaining in India were allowed to die out or to be otherwise eliminated in the course of time. During Lord Kitchener's visit to Nepal in 1906 the Prime Minister of Nepal expressed his willingness to allow Gurkha reservists to reside in Nepal and agreed to the re-opening of the Indian Army Reserve to this class, provided that it was regarded as an experiment for the first two years and that the matter was not made public in any way. Orders were accordingly issued allotting a reserve establishment of 100 men, per battalion, for the present, to each Gurkha battalion. The cost of the Gurkha Reserve will be included in that of the establishment of 50,000 reservists sanctioned by the Secretary of State for the Indian Army in 1904.

Satisfactory progress having been made, and the experiment justified, the Gurkha reserve was, with the consent of the Nepal Darbar, made permanent in 1910.

(50) RESERVISTS.

As reservists of the Indian army were found to be leaving India without permission, for employment in America, the Far East, etc., paragraph 1023, Army Regulations, India, Volume II, was amended to show that reservists leaving India become supernumerary to the strength during absence from India, and cease to draw reserve pay during such absence. The period during which they remain supernumerary is limited to two years and does not count for pension or gratuity. If resident abroad, they are not entitled to free passages either when coming to India for training, or when returning after such training. Men leaving India without permission are liable to trial by court-martial for disobedience of orders, even if they return to India in time for their next training.

(51) GURKHA RECRUITMENT.

The supply of recruits for Gurkha regiments of the Indian army has continued satisfactory, but the Prime Minister, Nepal, views with some alarm the strain put on the fighting classes by their enlistment in the Military Police and advises some easement in this direction.

(52) RECRUITMENT OF MAHSUDS.

It has long been recognised that the Mahsuds make excellent soldiers if they can be got to enlist. Their recruitment has also been held to be desirable on political grounds, as the regular pay, good prospects, prestige, and discipline of the Indian army, would cure them of their lawless and predatory habits. A scheme is accordingly now (August 1910) under consideration for re-organising the class constitution of the 127th, 129th and 130th Baluchis, which will admit of their enlistment therein, and which will ultimately provide for 1,000 Mahsuds in the ranks of the Indian army.

(53) RECRUITMENT OF INDIAN CHRISTIANS.

In connection with certain proposals for improving the class constitution of the 107th, 121st and 128th Pioneers, His Excellency the Army Member ordered the recruitment of Indian Christians for Upper India Pioneer regiments to be enquired into. It has, however, after due consideration, been decided that the question must be in abeyance for the present.

(54) RECRUITING FOR THE INDIAN ARMY IN RAJPUTANA AND CENTRAL INDIA.

In order to prevent friction, it has been decided by the Government of India that recruiting for the Indian Army in the Native States of Rajputana and Central India must not be carried out without the previous consent of the Darbars concerned.

(55) ABOLITION OF THE APPOINTMENT OF RECRUITING OFFICER FOR MADRASSI HINDUS AND CHRISTIANS, TRICHINOPOLY.

Very few recruits being now required for the Madras Regiments, it was considered unnecessary to maintain two recruiting officers to enlist Madrassis. One of the appointments was therefore abolished with effect from the 10th April 1910. The saving effected thereby amounts approximately to Rs. 13,000, per annum.

(56) ASSIMILATION OF THE PAID NON-COMMISSIONED RANKS IN ALL INDIAN CAVALRY REGIMENTS.

The want of uniformity in the strength, nomenclature, etc., of the non-commissioned ranks in the Native Cavalry, both Silladar and non-Silladar, throughout India, having given rise to various difficulties, this assimilation was considered essential on the grounds of training and discipline and was sanctioned by the Secretary of State in his telegram, dated 12th May 1908.

(57) ABOLITION OF THE RECRUIT AND PENSION BOY SYSTEM.

The abolition of the recruit and pension boy establishments in Infantry regiments of the late Madras and Bombay Commands was sanctioned by the Secretary of State for India in his despatch No. 66 of 1907 and has been given effect to. These establishments were a relic of pre-mutiny days and were not only antiquated but their abolition caused savings which were to be devoted to the very necessary purpose of raising the strengths of certain battalions to 912 of all ranks.

(58) IMPERIAL SERVICE TROOPS.

As an indication of the undiminished loyalty among the Rulers of Native States, it is interesting to note that no fewer than 16 of these offered their

troops for service in the Bazar Valley and Mohmand Expeditions of 1908, while the Imperial Service Troops of Bahawalpur are now permanently offered for active service whenever and wherever they may be required.

The Imperial Service Troops movement has been further voluntarily supported by the Maharana of Udaipur and the Maharaja of Kolhapur, while the Rulers of Bhopal, Bikaner and Rampur are particularly anxious that their offers of additional troops shall be accepted.

The Secretary of State having ruled that any additions to the Imperial Service Troops must be made within the 5,000 natives the addition of whom to the Indian Army is still permissible, the Foreign Department are considering the question of accepting these various offers.

(59) ARTILLERY ORGANISATION.

The establishments of the Howitzer brigade and Mountain artillery have been recast, and two batteries of Native mountain artillery, *viz.* No. 31 and No. 32, were in 1907, added to the Indian Establishment in order to complete the requirements of the field army. The establishments of batteries of Horse and Field artillery have also been revised to suit the new Quick-Firing Equipment.

(60) REORGANISATION OF ROYAL GARRISON ARTILLERY COAST DEFENCE COMPANIES.

In consequence of the revision of the armaments of coast defences in India and the disbandment of No. 89 Company Royal Garrison Artillery at Madras, it became necessary to reconsider the future establishments of Royal Garrison Artillery Coast Defence Companies, and of Coast Defence Lascars. Prior to November 1908, there were twelve such companies, distributed as shown in the margin, each consisting of five officers and

Aden	...	...	...	3	140 British ranks ; or, including the Staff,
Bombay	...	...	...	3	and the special position finding establish-
Karachi	...	...	...	1	ment at Aden, a total of 76 officers, 1,772
Hoogly	...	...	...	2	British ranks and 650 Coast Defence
Rangoon	...	...	...	1	Lascars. Owing to the revision in arma-
Madras	...	...	...		ments it was found possible to reduce these establishments, and proposals have

been placed before the Secretary of State to which sanction is awaited, for a total establishment of 73 officers, 1,362 British ranks, and 563 Coast Defence Lascars ; which will result in a saving of Rs. 2,66,000, a year, over and above the saving of nearly 2 lakhs effected by the disbandment of No. 89 Company, Royal Garrison Artillery. Under the new organisation proposed, there will still be 12 Companies, of an uniform strength of 5 officers and 110 British ranks, and they will be located as follows :—

Aden	...	...	...	...	3 Companies.
Bombay	...	...	...	...	4 "
Karachi	...	...	...	...	2 "
Rangoon	...	...	...	...	3 "
Hughli Defences	...	...	...	...	1 Company.

(60-A.) THE INDIAN STAFF COLLEGE.

The Indian Staff College, which, since its inception in 1905, had been temporarily located at Deolali, was, on the completion of the necessary build-

ings, moved to its permanent station at Quetta in May and opened on the 1st June 1906. A party consisting of two Professors and twenty students of the Indian Staff College were, with the courteous consent of the Japanese Government, deputed to visit the Manchurian battle-fields in May and June 1906. As an advance towards unity Australia has nominated an officer during 1910-11 to attend the Quetta Staff College and probably the same will be done in the year following.

(61) ESTABLISHMENT OF A CAVALRY SCHOOL IN INDIA.

The necessity has long been felt for the establishment of a Cavalry School in India, and the Secretary of State has now approved of this.

The School will provide for the training of :—

- (a) Officers of British and Indian Cavalry.
- (b) Officers of the Royal Horse Artillery.
- (c) Native officers of Indian Cavalry.
- (d) Non-commissioned officers of British and Indian Cavalry.

In addition to the above, officers of Royal Engineers will receive instruction in the co-operation of sappers with cavalry. In like manner officers of the Supply and Transport Corps will attend for training in the requirements of cavalry in the field and for instruction as to how these requirements can best be met.

The syllabus of the course of instruction carried out at the Home School, Netheravon, will, in the first instance, be taken as a general guide.

With a view to keeping expenditure at the lowest possible limit, the horses required at the school, *viz.*, 185, have been drawn from the existing reserve of 500 Cavalry horses. These will be retained 2 years at the School and then issued to units.

The Army cost of this measure was estimated at—

						Rs.
Initial	...	...	...	...	...	10,300
Recurring	...	...	...	...	...	1,53,000
Total						<u>1,63,300</u>

The building charges estimated at Rs. 1,47,000, are due chiefly to the adaptation to the purposes of the School of vacant barracks at Saugor, where the school is to be located.

To obviate the India Army budget being correspondingly increased on account of the funds required for this measure, most of the Mounted Infantry Schools have been closed, the charges in connection with which amounted to considerably more than the cost of this School which was opened for instruction on the 1st September 1910.

(62) MAINTENANCE OF SMALL ARMS AMMUNITION IN REGIMENTAL CHARGE.

The scale authorised to be maintained in regimental charge by British units having been found inadequate to meet emergencies, it was decided to issue a special reserve as noted below :—

British Cavalry	...	...	...	...	50 boxes.
British Infantry	...	...	...	...	100 „

(63) INTRODUCTION OF THE COLD SHOEING SYSTEM.

As it was realised that the only possible method of shoeing horses when on service was by "cold shoeing", the question of the introduction into India of the Home system of cold shoeing in peace time was raised and has been under consideration during the past four years. Recently, the Government of India has been asked to sanction the introduction of this system, with certain modifications considered necessary to meet Indian requirements, in place of the present Contract system, which it is proposed to abolish. The financial effect of the scheme will be a saving to Government of Rs. 30,000 annually.

(64) PROVISION OF MACHINE GUN MULES FOR INFANTRY BATTALIONS OF THE THREE INDEPENDENT FRONTIER BRIGADES.

The nine Infantry battalions serving in the Bannu, Derajat and Kohat Brigades are not in the Field Army, but owing to their being liable to be called out at short notice to suppress local disturbances, etc., it is imperative that they should be prepared to move out, fully equipped, at any moment. These regiments are already in possession of machine guns, but, owing to financial reasons, it has not been found possible to provide them with their complement of mules. The necessity for these battalions being fully equipped, in all respects, for field service has been recognised both by the Secretary of State and the Government of India, and steps have been taken to provide them with mules during the current financial year.

(65) RIFLE CARRYING EQUIPMENT FOR CAVALRY.

At present Indian Cavalry are equipped with the Patterson rifle carrying equipment, but as this pattern is not altogether suitable, it has been decided to adopt the War Office pattern of rifle carrying bucket at a cost of Rs. 1,56,371 initial, and Rs. 1,368 annual recurring.

The British Cavalry at present are equipped with the Taylor rifle carrying equipment, which will be replaced when worn out by the new pattern.

Manufacture was commenced in 1909-10, and it is expected that all Indian Cavalry will be equipped by the end of 1910-11.

(66) EQUIPMENT FOR CARRYING MACHINE GUNS.

A scheme is under consideration for the provision of an improved pattern of equipment for carrying machine guns.

(67) PROPORTION OF BRITISH TO NATIVE TROOPS.

In 1859 the Royal Commission on the organization of the Indian Army laid down three principles which have consistently guided the Government of India ever since in all questions of Army organisation. These were (1) that the Artillery should be mainly a European force, (2) that great caution should be used in not giving to the military police force a stricter military training than may be required for the maintenance of discipline, lest a new native force be formed, and (3) that the amount of Native force should not, in present circumstances, bear a greater proportion to the European in Cavalry and Infantry than two to one for Bengal, and three to one for Madras and Bombay, respectively. This proportion as regards British to Native Troops continued to

operate till 1893, when Lord Lansdowne's Government suggested that the proportion of British to Native Cavalry and Infantry for the future should be one British to two and a half native soldiers—a proposition which was accepted by Lord Kimberley, the then Secretary of State, who repeated the warning of the Commission of 1859 in regard to the military police and referred expressly to the necessity of excluding the Artillery from the calculation of the European force.

This question of proportions had in April 1906 to be considered exhaustively in connection with the proposals of the Government of India for adding 1496 men to the Indian Army. The Government of India in their despatch No. 36, dated the 12th April 1906, placed before the Secretary of State their reasons for believing that several thousands of men could still be added to the Native Army without infringing the accepted proportion, and these reasons were considered by the Secretary of State for India in his despatch No. 66, dated the 19th April 1907, in which, while sanctioning the addition of 1,496 men asked for, he maintained that no further increase to the Native Army was permissible without a careful examination of the character and strength of the military police, and of the whole question generally. The Secretary of State expressly dissented from the view of the Government of India that Gurkhas and Hazaras should be omitted from the Native side of the account, and stated that it might be necessary to count the Native Military police as a factor in calculating the strength of the native forces. These various contentions of the Secretary of State were dealt with in detail in Government of India despatch No. 57 of 1908, in which it was shown that the great extension of railways and telegraphs, and the vastly increased power of modern artillery, had greatly enhanced the margin of safety on the British side; and that it was still possible, on the Secretary of State's own system of calculating the proportion, to add 7,000 native soldiers. The Government of India further suggested a more uniform method of reckoning the Imperial Service Troops. The various points brought to notice were considered by Lord Morley in his despatch No. 207 of 13th November 1908, in which he agreed that 5,000 native soldiers might still be added to the Indian Army, and requested that the whole question should be reviewed once in every five years.

Lord Morley's decision that this addition of 5,000 native soldiers must include Imperial Service Troops, has led to considerable difficulty as regards certain offers of Imperial Service Troops, the acceptance of which on political grounds is advisable, inasmuch as it is recognised that the acceptance of such offers will correspondingly reduce the additions still permissible for the Indian Army, should such additions be found to be necessary in the future. As the result of a further reference to the Secretary of State on the subject, Lord Morley has now decided that these offers of Imperial Service Troops shall be accepted within the 5,000 native soldiers still permissible, but that no further offers of Imperial Service Troops shall be considered.

CHAPTER IV.

PROGRESS IN MOBILISATION AND DEFENCE REQUIREMENTS.

(68) DESPATCH OF REINFORCEMENTS TO INDIA IN THE EVENT OF A WAR WITH RUSSIA.

During the past few years the power of Russia to attack India, and the reinforcements that would have to be despatched to this country during the first year of such a campaign, have been exhaustively considered. The investigations made in India were placed before the Home authorities, and, after prolonged examination by the General Staff of the War Office and Committee of Imperial Defence, certain conclusions were arrived at.

A detailed scheme for the despatch of the reinforcements considered necessary was received from the War Office in the autumn of 1905, and, subject to a few minor alterations, was accepted by the Government of India (*vide* Military Despatch No. 161, dated 14th December 1905.) The question was thus placed on a more satisfactory footing, and certain details concerning the equipment of the reinforcements and the reserves of material they should bring with them, only remained to be settled.

In September 1906, intimation was received from the Secretary of State that the Committee of Imperial Defence, at their 88th meeting held on the 25th May 1906, had arrived at the conclusion that no definite undertaking should be given by the Home authorities to supply India with a specified number of troops in the event of war with Russia. In view of this the Army Council considered it essential that the Government of India should be at once informed that "plans for the defence of India must be based upon the actual resources of the Army in India alone, and that no more definite promise of assistance can be given than a general assurance that the Home Army would be bound to support India to the utmost extent of its power".

This decision was considered of such importance by the Government of India as to require a special representation to His Majesty's Government, in order that the full aspect and dangers of the position should be clearly understood, and that, before war became imminent, such arrangements might be arrived at as would enable the Government to uphold their pledges to maintain the integrity of Afghanistan and to safeguard our own possessions [*vide* Military Despatch No. 94 (Secret), dated the 8th November 1906]. The question was one of those examined by the Defence Committee of the Cabinet during the deputation to England of Lieutenant-General Sir Beauchamp Duff, Chief of the Staff. The results, however, have not yet been communicated officially.

In 1906, the War Office, through the Secretary of State for India, submitted for the remarks of the Government of India, proof copies of mobilisation store tables in the event of reinforcements being sent from England to India.

The Government of India in their reply to the Secretary of State, informed him that the War Office decision that no definite statement of the actual force to be sent to India could be given, did not prejudice the settlement of the question of equipments, and, after careful scrutiny, they found that the

mobilisation store tables, having been specially prepared, differed from both the Indian and War Office Field Service Tables.

The Government of India requested that the reinforcements should come to India with their horses, tents, clothing, and equipment, and at the strength laid down in the War Office Field Service Manuals (with certain exceptions). On arrival in India the units would be completed with pack transport and followers and proceed to the front on Indian field service strengths, forming a dépôt with the difference between their Home and Indian strengths.

(69) ORDNANCE FIELD PARKS.

Provision to the extent of Rs. 1,41,976 was made in the estimates for 1906-07 for the completion of the stores of four ordnance field parks. Of the above amount, the sum of Rs. 89,292 was for stores to meet the requirements of silladar cavalry, consequent on the decision that silladar cavalry in the field will be supplied by Government with renewals of equipment. The remaining sum, *viz.*, Rs. 52,679, is for local stores which are to be maintained on an increased scale and are in addition to the requirements of silladar cavalry.

(70) RESERVE OF RIFLES.

It has been accepted after detailed examination of all requirements, that a reserve of 140,910 rifles is required for purposes of mobilisation on a large scale. Of this number only 41,703 remained to be provided in 1906-07. It was anticipated that 6,000 rifles and bayonets towards meeting this deficiency, would be manufactured in that year at Ishapore, but this expectation was not realised. In the following year provision was made for the manufacture of 10,000 rifles and bayonets in India, but this outturn was not obtained, as owing to the change of pattern of rifle, certain new machinery had to be obtained from England. It was again hoped that 6,000 rifles would be manufactured in India in 1908-09 at Ishapore, and provision was made accordingly, but only 3,000 were actually made up. Owing to delay in the receipt of the necessary plant and machinery from England, only 4,980 rifles, complete, were manufactured during 1909-10, but it is expected that 10,000 rifles will be ready by the end of the current year. The reserve of rifles for war purposes has thus not yet been completed to the full number but the deficiency is not great compared with the total reserve required.

(71) RESERVE OF SMALL ARMS AMMUNITION.

It has been accepted that a reserve of 210 million rounds of small arms ammunition is required for war purposes. Of this number 193 million rounds were actually in stock or nearing completion of manufacture at the close of 1905-06, and a sum of $5\frac{1}{2}$ lakhs was provided in 1906-07 towards providing the reserve. It was decided in 1907-08 that $13\frac{1}{2}$ million rounds should be manufactured in that year for the authorised reserve which is now practically complete.

(72) REARMAMENT OF HORSE AND FIELD ARTILLERY.

According to the latest, 1910, estimates, the total cost of the rearmament of horse and field batteries with quick-firing guns will be Rs. 25,82,085 Indian, and Rs. 2,26,26,035 (£1,508,402), Home. Of this expenditure Rs. 12,62,226 Indian

and £1,470,952 Home, has already been allotted, and of the balance remaining, a sum of Rs. 3,35,078, was provided in the Indian estimates of 1906-07 to complete the manufacture of 13-pr. and 18-pr. guns obtained from England, and for the manufacture of eight 18-pr. and three 13-pr. batteries in India. Eleven batteries of Royal Horse Artillery and thirty-three batteries of Royal Field Artillery were rearmed with the new Quick-Firing equipment during 1907-08, leaving, at the end of that year, nine batteries of the latter still to be equipped. Provision was also made in the estimates of 1907-08 to admit of the manufacture in India of eleven reserve batteries. A further battery of Royal Field Artillery having been equipped, left eight internal defence batteries to be equipped, for which provision was also made in the estimates of 1907-08 to admit of their manufacture in India; but in consequence of the pressure of other orders this was not realised in that year. In the following year, however, *viz.*, 1908-09, the rearmament of all Horse and Field batteries with Quick-Firing equipment was practically completed. The guns, gun-carriages, and vehicles of eight batteries are of Indian manufacture. Owing to weakness which developed, the reconstruction of the artillery vehicles received from England was taken in hand, and the necessary alteration to twenty-five batteries has been completed. Provision was made in the estimates of 1909-10 for the reconstruction of the remaining vehicles received from England and it is anticipated that the entire reconstruction will be completed in 1910-11. Fifty-three batteries of Horse and Field Artillery, and ten Ammunition Columns are now in possession of Mark II, I-P strengthened equipment, and the remaining Ammunition Columns will, it is anticipated, be completed this year.

(73) RESERVES OF ARTILLERY AMMUNITION.

In connection with Lord Kitchener's scheme for the reorganisation of the army in India and preparations for war, proposals were made for increasing the reserve of artillery ammunition at the then estimated cost of $1\frac{1}{2}$ crores initial, and about 9 lakhs recurring. It was subsequently decided that the requirements of inland and coast defences need not be considered at present. The estimate of cost was therefore reduced to one crore and three and-a-half lakhs initial, and $3\frac{1}{2}$ lakhs recurring. An expenditure of over 21 lakhs had already been incurred by the end of 1905-06 towards this measure, and the sum of Rs. 23,59,232 was provided in the estimates of 1906-07. In the following year, *viz.*, 1907-08, provision to the extent of Rs. 2,56,805 was made towards the authorised reserve. The reserve required to be maintained for batteries of artillery was completed in 1908-09, in which year the machinery required to increase the manufacturing power of Ordnance factories was also obtained except that for the manufacture of fuzes for lyddite shell. This was obtained in 1909-10. Materials of Europe supply required to be maintained as a war reserve have been received, and it is anticipated that the manufacture of components of ammunition to be maintained as a war reserve in a semi-manufactured state will be completed in 1910-11.

(74) PROVISION OF MAXIM GUNS AND MOUNTINGS.

It was originally estimated that a total of 590 Maxim guns would be required under the scheme for the preparation of the Army in India for war, but this number was subsequently reduced to 530, and is now re-estimated at 540. Of this number 287 Maxims were already in possession when that scheme was drawn up, leaving 253, at that date, still to be provided. The estimated cost of these was Rs. 4,70,112 Home, and Rs. 1,14,888 Indian expenditure; or a total initial cost of Rs. 5,85,000, with an estimated annual

expenditure of Rs. 64,000. Towards this deficiency of 253 Maxims, 100 guns and the Europe stores required for the manufacture of mountings in India, were purchased in 1904-05; and 35 more guns were purchased in 1908-09, leaving at the present time a deficiency of 118 Maxim guns required for the purposes of the field army. In 1909-10 funds were provided for the local stores required for mounting these 118 guns; but no guns are to be purchased in 1910-11 owing to the financial stringency.

(75) EQUIPMENT MULES FOR PIONEER REGIMENTS.

Thirty equipment mules have been supplied to each of four Pioneer Battalions added to the Field Army.

(76) TELESCOPES AND MONOCULARS.

Of the 194 telescopes and 4,636 monoculars required for the field army, the full number of the former and 1,500 of the latter were obtained from England in 1907-08, and the remainder obtained in 1908-09. The total cost of these is Rs. 1,18,333.

(77) LIGHT ENTRENCHING TOOLS FOR INFANTRY.

The experience of recent campaigns having proved the necessity for equipping each infantry soldier with a light entrenching tool as part of his personal equipment, it was decided in 1908-09 to obtain from England 39,552 sets of these tools in order to fully equip the whole of the British and native infantry units in the first six divisions. The "Sirhind" pattern tool has been selected, and the scale decided on was 600 for each British Infantry regiment, and 524 for each Indian Infantry regiment. These have been provided. It has now also been decided to supply these tools to *all* British and Infantry units, excluding Pioneers, whether in the Field Army or not. It is calculated that the total number of tools required, including a reserve of 10 per cent, is 1,04,064 sets, costing Rs. 3,08,915 initial and Rs. 85,923 recurring expenditure. Excluding the sets already provided, *viz.*, 39,552 for the first six Divisions and a ten per cent reserve of 3955, funds have been provided in 1910-11 to complete the total required during that year.

(78) X-RAY APPARATUS.

Arrangements were made for the provision of 15 sets of X-ray apparatus (including spare sets) for use with each Division of the Indian Army during peace and war.

(79) ALTERATION OF THE MEDICAL AND SURGICAL EQUIPMENT OF EXISTING FIELD HOSPITALS AND REGIMENTAL UNITS TO THE PATTERN AND SCALE APPROVED BY SURGEON-GENERAL SIR T. GALLWEY, PRINCIPAL MEDICAL OFFICER, HIS MAJESTY'S FORCES IN INDIA, IN 1905.

The equipment of field hospitals was revised in accordance with the recommendations of the Field Hospital equipment committee of 1898. The medical and surgical stores of the revised equipments, were obtained in 1903, but were found by the Packing Committee of that year to be unsuitable in some cases for field hospital use on account of their size and pattern. Eventually standard pattern field hospital sections were decided on. The imported stores for the 56 additional field hospitals recently formed have been obtained on the revised scale and pattern, and the necessity for gradually altering the medical and

surgical equipment of the 78 existing field hospitals, and of regiments, to that scale and pattern has been accepted. The cost is estimated at Rs. 3,81,460, and the measure is being carried out gradually as funds became available.

(80). ADDITION OF 56 FIELD AND 11 GENERAL HOSPITALS.

The supply of all stores (excepting tongas) for these hospitals has been completed.

(81) PROVISION OF ADDITIONAL FIELD MEDICAL STORE DÉPÔTS.

Up to recently only four Field Medical Store dépôts were maintained for the field army ; but in view of the field army having under Lord Kitchener's Redistribution and Reroganisation Schemes been increased to 9 Divisions, it was essential that the number of the Field Medical Store Dépôts should be increased from four to nine. At the same time it was found desirable to revise the list of surgical and medical equipment and drugs for these dépôts. The total cost of revising the equipment of the existing four and of providing the additional five dépôts, is estimated at Rs. 61,000, towards which a sum of Rs. 22,000 has been provided in 1910-11.

(82) BEARING OF THE ANGLO-RUSSIAN CONVENTION ON INDIAN MILITARY EXPENDITURE.

After the conclusion of the Anglo-Russian Convention the Secretary of State for India drew the attention of the Government of India to its bearing on military policy and Indian Military expenditure, and, in view thereof, doubted if certain measures proposed by the Government of India, in furtherance of Lord Kitchener's Redistribution and Preparation for War Schemes, needed to be proceeded with.

The Government of India, in reply, whilst agreeing to the postponement of certain measures, etc., requested that sanction might be accorded to :—

(I) The conversion of three more companies of Royal Garrison Artillery into mobile heavy batteries, in order to bring the total of these batteries to nine and so admit of one being allotted to each Division of the Field Army.

(II) Formation of four Field Telegraph companies.

(III) Location of a Cavalry Brigade at Baleli, near Quetta ;

and stated that they proposed to carry to completion, not only measures then actually in progress, but also those which were then before the Secretary of State for India for approval, together with such measures as had received his sanction but which had not then been commenced.

The Secretary of State for India in reply stated that the conversion of three more companies of Royal Garrison Artillery into mobile heavy batteries might well be deferred for consideration until the most suitable type of gun for heavy batteries had been decided upon ; but sanctioned the formation of the four Field Telegraph companies required. He also agreed that works actually in progress might be proceeded with ; but did not accept the proposal that works, for which sanction had been accorded but not begun, should be carried out, and expressed his unwillingness to give a general sanction to the commencement of the measures which had been submitted to him for approval but which had not been approved. He further asked that, when requesting sanction to any proposal

involving new military expenditure, the Government of India would in future furnish him with an estimate of the total military and military works expenditure of the year in which it is proposed to carry out the measure.

With regard to the proposed location of the Cavalry Brigade at Baleli, the Secretary of State has decided that the measure should be deferred for future consideration.

(83) "HOMOGENEOUS AND MIXED" INFANTRY BRIGADES.

It was decided in 1908-09 that instead of maintaining one allotment of troops to the Field Army for a great war, two allotments, differing as regards infantry, should be prepared, *viz* :—

- (i) To meet the requirements of a war against a European enemy, the Divisions being composed of Homogeneous Brigades of British or Indian Infantry; and
- (ii) To meet the requirements of a war against Asiatics, the Divisions being formed of Brigades containing both British and Indian battalions.

This has accordingly been done.

(84) BASE OF OPERATIONS AT KOHAT FOR CENTRAL LINE OF ADVANCE.

Consequent on the conversion to broad-gauge of the narrow-gauge railway from Kushalgarh to Kohat on the Kushalgarh-Kohat-Thall Railway, the question of the formation of a temporary base of operations at Kohat for troops concentrating on the Central Line of Advance in the event of a general mobilisation, received consideration.

On the completion of the proposed extension of the broad-gauge system to the foot of the Peiwar Kotal, a permanent base of operations will be established at rail-head, similar to that which now exists at Chaman on the Southern Line of Advance, and in place of the temporary base at Kohat.

(85) ORGANISATION OF A BASE AT KACHA GARHI.

Experience having shown the inadequacy of the mobilisation arrangements at Peshawar, a committee, presided over by Sir E. G. Barrow was appointed in 1906 to consider the question of establishing a base dépôt at Kacha Garhi. The committee submitted various recommendations, among which was the early purchase of the necessary land. This was acquired in 1908-09 at a cost of Rs. 50,480 and reported to Secretary of State.

As the next step towards organising the base dépôt, the Chief of the General Staff in September 1909 proposed that a sum of Rs. 1,66,241, should be provided through the September 1909 Schedule as initial Military Works expenditure for the required sidings. Over and above this expenditure a sum of Rs. 4,00,810, chargeable to the Railway Administration, is required for Railway equipment and material, in return for which the Military Works Grant will have to pay an annual rental charge of Rs. 32,211; and before the scheme can be fully completed there will be further Military Works expenditure of Rs. 2,40,317, for barracks, store godowns, water supply, etc., and possibly Rs. 28,500 for quarters for officers and subordinates. The whole scheme will thus before completion cost an initial sum of Rs. 8,59,173 and a recurring sum of Rs. 32,211.

The Secretary of State not having been informed of the scheme as a whole His Excellency the Army Member in September 1909 decided that no provision should be made at present for it in view of more urgent demands.

The case was then reopened by the Chief of the General Staff who, in April 1910, asked the Railway Board whether the cost of the sidings should not be borne by the North Western Railway. To this the Railway Board replied that as the base dépôt was being constructed entirely for military requirements they could not accept any share of the cost.

They also stated that the cost of the scheme had just been reported by the North Western Railway to be Rs. 12,81,000, and asked that its position should be made clear, in view of the fact that the sanction of the Secretary of State had not been obtained, and His Excellency the Commander-in-Chief did not wish to press it. Accordingly His Excellency the Commander-in-Chief reconsidered the whole question and decided that while the scheme was very desirable, and should not be lost sight of, it was not of such immediate urgency as to require preferential consideration, many other measures of greater urgency being still unprovided for. The measure is therefore to be submitted for consideration next year.

(86) FORMATION OF SIGNAL COMPANIES.

In Lord Kitchener's scheme for the "Preparation of the Army in India for war" submitted to Secretary of State with Military despatch No. 47, dated the 31st March 1904, the unsatisfactory nature of the present signal arrangements on service was discussed, and it was proposed that 4 Telegraph Companies, each 120 strong, should be formed at a cost of Rs. 1,88,000, initial, and Rs. 3,60,000 recurring, exclusive of buildings. This item has been included throughout in the list of measures proposed to be undertaken as funds could be made available, and in the Secretary of State's Financial despatch No. 137, dated the 16th October 1908, the formation of these Telegraph Companies was finally approved.

The manner in which our service of communications in the field should be improved was postponed till May 1909, when an advance copy of the report of the Home Committee on the co-ordination of methods of communication, etc., was received, and a Committee to consider the above and to report finally what organisation would be best suited to the requirements of India was assembled. They recommended the addition of a senior staff officer to the Army Head Quarter's staff to be charged with the study of the various means of communications in war, and the co-ordination of the training of the units; the raising of separate signal units to be affiliated to the existing corps of Sappers and Miners; the eventual provision of an Army Signal Company for each line of advance; of a Wireless Signal Company capable of maintaining communication between the commander on each line of operations and the advanced cavalry; and a Signal Company for each Division of the Field Army. In view, however, of the present financial situation it is proposed that, at the outset, only 4 Divisional Signal Companies and a Wireless Section should be raised and the Staff officer provided.

The Committee further proposed that the company officers be selected from any arm of the service, their employment with the signal units being limited to 4 years, that the British ranks should be drawn from the Royal Engineers at

Home, and from Royal Engineer and other arms of the service in India, that the Indian ranks should be drawn from the Sappers and Miners and the Indian Army generally, the personnel being paid at Royal Engineer rates in the case of Europeans, and at Sapper and Miner rates in the case of Indians. The abolition of the existing Telegraph Sections of the Sappers and Miners and of the two existing Signalling Schools and inspection staffs, are also advocated, it being held that the Commander of the Divisional Signal Company, once these units are completely trained, can undertake the control of the visual signalling instruction of the units located in the divisional areas. These proposals have been accepted but it is proposed, in the interests of economy, to absorb into these units the 5 Royal Engineer officers now authorised for the three special service companies of the Sappers and Miners and to utilise 15 of the 350 additional officers authorised for the Indian Army. With these 20 officers and the two Inspectors of Army Signalling proposed to be abolished, the proposals will not involve any change in the complement of officers serving in India. By this revision the cost is reduced to Rs. 2,24,615 initial, and Rs. 3,41,247 recurring, exclusive of the cost of buildings. The latter are roughly estimated to cost, at general building rates, Rs. 2,44,300.

In the estimates of 1910-11 provision has been made for the purchase of the whole of the required equipment in that year, and also such funds as appear likely to be required for the appointment of the Staff officer and for the formation of the 4 Divisional Signal Companies and the Wireless Section within the year. Rs. 1,00,000 have also been provided for the commencement of work on the necessary buildings. His Excellency the Commander-in-Chief is anxious that the new organisation should be in full working order by the end of 1910-11.

The above proposals were placed before the Secretary of State in August 1910, and his sanction having been received in September 1910, the Companies are in process of formation.

(87) SYSTEM OF VISUAL SIGNALLING.

Until recently the Indian system of visual signalling differed from that obtaining at Home in the following respects:—Inspections, coding, counting, transmission and checking of messages. It was considered imperative that in case the Home and Indian Armies were required to take the field together, there should be an universal system of signalling throughout the Army. Steps have accordingly been taken and the Home system adopted from 1907-08, and all the necessary Army Forms introduced. All the telescopes and monoculars required for the purpose have been provided.

(88) PROVISION OF TELEPHONE EQUIPMENT FOR THE FIELD ARMY.

It was decided in 1906 that all units in the Field Army should be equipped with telephonic equipment, and funds were allotted during 1907-08, 1908-09, and 1909-10 for this purpose. The measure has now been completed.

(89) COAST DEFENCES.

Owing to an improvement in the strategical conditions in Indian waters it was decided that the 7·5" B. L. guns destined for Madras and Rangoon defences were not required. Accordingly, in November 1906, an offer from the Admiralty for these guns was accepted; and, though only half the cost price was

realised on the guns, yet the savings accruing from works, mountings and accessories no longer necessary, resulted in a net economy of over £25,000 in capital outlay, besides the annual recurring cost for maintenance and personnel.

The total cost of the Special Defences scheme for the revision of the armament of the coast defences was in 1905-06 estimated at Rs. 1,22,76,000, towards which the Imperial Government will probably contribute Rs. 3,79,000 as half the amount of the Aden expenditure. It was, however, recognised at the time that the cost would probably be reduced in consequence of the recent modification of the naval policy of the Empire in the matter of port defence. The total cost of the Special Defences scheme for the revision of the armament of the coast defences was accordingly in 1906-07 reduced to Rs. 1,08,93,000, towards which the Imperial Government would contribute Rs. 12,500 as half the amount of the Aden expenditure as then estimated. A complete estimate, however, could not be given until the question of duplicating the lights at Forts Morbut and Tarshayne, Aden Defences, which was under the consideration of the Army Department, was settled.

The Admiralty having suggested the abolition of the submarine defences in Indian ports, the minefields in the Hooghly were removed in 1906.

In view of the considerations advanced by the Lords Commissioners of the Admiralty and of the extra expenditure which would have fallen upon Indian funds on account of the Submarine Mining training establishments, necessitated by the abolition of Submarine Mining at Home, it was decided to abolish the remaining Submarine minefields at Rangoon, Bombay and Karachi. At Rangoon and Karachi they were not, however, removed till the receipt of the 7.5 inch guns from England.

The fixed defences of Indian ports were then reconsidered in the light of this decision, and also of the scales of attack to which, in the opinion of the Lords Commissioners of the Admiralty, Indian ports would be liable.

Recommendations were accordingly submitted which will result in a sensible economy while maintaining the coast defences at a standard adequate to existing strategical conditions.

The fixed defences of Aden have been the subject of a separate recommendation which has been concurred in by the Secretary of State, and will result in an ultimate economy to Indian revenues, combined with a standard of defence suitable to cope with the class of attack considered likely by the Naval authorities.

The various recommendations of the Indian Defence Committee regarding the fixed defences of Indian ports have now received the sanction of the Secretary of State, and the alterations entailed in the defences of the various ports are being proceeded with. When completed, considerable economies will accrue.

The fixed armament of the defences of Madras has, as an outcome of the above recommendations, been abolished, and a saving in expenditure has thereby already been effected.

The proposals regarding the armament of Aden, which have received the sanction of the Secretary of State, are also being taken in hand, and, when completed, there will be a reduction in the military expenditure at this place.

The question of the necessity for the retention of Marsh Fort, Karachi, was considered by the Defence Committee who, agreeing with the opinion of the Admiralty, recommended its abolition. The Secretary of State has approved of this recommendation. One of the 7·5" B.L. guns intended for Marsh Fort is to be mounted in Manora in place of the two existing B.L. guns, when funds are available.

The alterations in the armaments of the Aden, Bombay, and Hughli Defences, already sanctioned by the Secretary of State are nearing completion.

(90) INTERNAL DEFENCE.

In accordance with the principles of Lord Kitchener's Redistribution Scheme, schemes, prepared in consultation with the civil authorities, have been prepared for the defence of internal areas on general mobilisation. These internal defence schemes follow, in the main, the outlines foreshadowed in paragraph 38 of the Redistribution Scheme, and generally provide moveable columns for the safeguarding of specified areas. They are annually revised and brought up to date, and all the civil authorities concerned are kept in touch with it by such revision.

The obsolete armament of the principal inland defences are being replaced by more suitable modern guns which have become available by the rearmament of the Horse and Field Artillery.

(91) TRANSPORT FOR SILLADAR CAVALRY.

A revised system for the provision of transport to silladar cavalry regiments on general mobilisation has been sanctioned. Under this system the State undertakes the entire supply of the transport.

(92) CONVERSION OF THE PRESENT BULLOCK HEAVY BATTERIES INTO FULLY HORSED HEAVY BATTERIES.

The Secretary of State in 1908 and 1909 approved of the heavy batteries with bullock draught being fully horsed. The total cost of the conversion from bullock to horse draught is estimated at Rs. 2,11,892 initial, and Rs. 70,477 recurring; but owing to lack of funds this measure has not yet been carried out. The requisite steps will be taken when funds become available. These batteries when horsed are to be located at Peshawar and Quetta.

(93) ADDITION OF 8 NEW ROYAL HORSE ARTILLERY AND ROYAL FIELD ARTILLERY AMMUNITION COLUMNS.

This measure was one of those recommended in Lord Kitchener's Scheme for the preparation of the Army in India for War, as being necessary to meet the requirements of the Field Army. The measure was sanctioned by the Secretary of State in 1908. These columns represent an increase to the established strength of 20 British officers, 328 British soldiers, 984 Indian combatants, 1,024 public followers, and 1,796 horses. The latest estimate places the cost of the measure at Rs. 18,49,320 initial, and an eventual recurring cost of Rs. 14,42,533. This initial expenditure represents a considerable saving on the original estimate, which has been effected by utilising, with some alterations, the former 15-pr. ammunition wagons for the carriage of ammunition, instead of manufacturing, as originally intended, new limbered wagons for the purpose.

The columns were practically completed in personnel, horses and equipment in 1909-10, and the only remaining requirements are the completion of lines, and the purchase of some line bullocks. The horses for these columns were taken from the reserve of 2,500 artillery horses, which is now being replaced.

(94) INCREASE OF THE INDIAN ARMY RESERVES TO 50,000.

This measure, initiated during the Viceroyalty of Lord Curzon, had not at its close made much progress, and steps for its gradual completion have been continued. In 1904 the authorised reserve stood at 24,922 men, and it was then decided to raise it to 50,000, by annual additions of 2,500 men. With a view to reduce the cost of the measure, the reserve pay for new entrants was fixed at Rs. 2, per mensem, instead of Rs. 3, as formerly. It was also subsequently decided to extend the reserve system to the Silladar Cavalry and to Gurkha regiments, the numbers for them being found within the 50,000. The latest estimated cost of the measure, including provision of rifles, accoutrements, kit money, etc., is Rs. 33,04,530 initial and Rs. 12,49,954 recurring. Owing to financial stringency and other causes, it has not always been found possible to add 2,500 men every year to the reserve, which consequently is not at the present time at its authorised strength. On the 31st March 1910 although the Reserve had only reached 34,731 or 1,005 below what it should have been on that date, *viz.*, 35,736 men, no provision could be made during the current year for a further increase.

(95) RECONSTITUTION OF THE RESERVE OF ARTILLERY HORSES.

The reserve of 2,500 Artillery horses was in 1907-08 utilised temporarily for the reorganisation of the Royal Horse Artillery and Royal Field Artillery and addition of 8 Ammunition Columns, on the understanding that it would be replaced as soon as funds could be made available. The estimated cost of replacing these horses is Rs. 18,50,000 initial, and Rs. 9,80,000 recurring. It was originally proposed to replace 1,000 horses in 1910-11, but funds could only be made available for the purchase of 250 reserve artillery horses at an initial cost of Rs. 1,85,000 and Rs. 22,000 recurring.

CHAPTER V.

FIELD AND OTHER ACTIVE OPERATIONS.

(96) WELLAUNG AND YACHUMI EXPEDITION.

Almost immediately on Lord Minto's assumption of office the following minor quasi-military operations had to be undertaken :—

- (a) Punitive expedition against the village of Wellaung in the Chin Hills, Burma.
- (b) Punitive expedition against Yachumi village in the Naga Hills, Assam.

The Wellaung Expedition.—In October 1905, the Burma Government was authorised to send an expedition against the village of Wellaung to inflict punishment for the murder of three men. The column, consisting of 200 rifles and one mountain gun, under Mr. Street, Superintendent, Chin Hills, and Captain Kirke, R.A., left Haka on the 20th November, occupied the village of Wellaung on the 6th December without resistance, captured the ringleaders concerned in the murder mentioned above and recovered the fine imposed. The expedition reached Haka on its return journey on the 5th January 1906.

The Yachumi Expedition.—In September 1905 the Lieutenant-Governor of Eastern Bengal and Assam reported the murder of a British subject by some Nagas of the village of Yachumi, in the unadministered tracts. As the villagers were unable to produce those connected with the murder, a force of 100 Military Police left Mokokchang on the 5th February 1906, under Mr. W. J. Reid, Deputy Commissioner, Naga Hills, and reached Yachumi on the 10th of that month. As the murderer had decamped a fine of 30 "Mithuns" (cattle of the country), was inflicted on, and realised immediately from the village. The village of Kahomi, which had harboured the murderer, was burnt, and a few pigs and fowls destroyed. The expedition recrossed into British territory on the 15th February 1906 without further incident.

(97) PERSIA.

The question of the military action which Great Britain might have to take in the event of the collapse of the Central Government of Persia was considered in 1906, and a scheme of operations kept in readiness in case of need.

(98) RAID ON VILLAGE OF TANGI.

On the 9th April 1906, a serious raid was committed on the village of Tangi, near Abazai. The raiders got away with a considerable amount of booty. It was thought possible that other raids might be attempted in the same neighbourhood, and, accordingly, a squadron of Guides Cavalry were located at Abazai and another of the 21st Cavalry at Shabkadr.

(99) BAZAAR VALLEY EXPEDITION.

Owing to the misbehaviour of the Zakka Khel Afridis, which culminated in the raids into the Peshawar District in January 1908, the Secretary of State

sanctioned operations being undertaken against this clan. Accordingly, a force—*vide Appendix B*—was secretly mobilised, ostensibly for manœuvres, consisting of three mixed Infantry Brigades, with Divisional Troops. On the 15th February, the main body under Major-General Sir J. Willcocks, K.C.M.G., C.B., D.S.O., crossed the Chora Pass from Lala China to Walai, leaving the third Brigade in reserve. The same day a force of Khyber Rifles, under Lieutenant-Colonel G. O. Roos-Keppel, C.I.E., moved from Landi Kotal to China *via* the Bazar Pass. The Zakka Khel were taken by surprise, and both advances were almost unopposed. The two forces joined hands near China on the 16th February. The next few days were spent in destroying towers, in a reconnaissance to the Tsatsobi Pass, and in a successful attack upon Halwai. Meanwhile, negotiations were in progress. General Willcocks interviewed representatives of the other Afridi clans, at China, on the 23rd February. The latter met the Zakka Khel elders at Halwai, who promised to assist in punishing the raiders. On the 27th February General Willcocks received a *jirga* in open Durbar, when each of the clans expressed their willingness to be held responsible for the good behaviour of one or more sections of the Zakka Khel and deposited 53 rifles as security. On the 29th February the force left the Bazaar Valley, reaching Peshawar on the 2nd March, without a shot being fired during the return march.

(100) MOHMAND EXPEDITION.

During the month of March 1908, there were considerable signs of unrest in the Mohmand country owing to the preaching of the *mullas* during the Zakka Khel operations. The tribesmen gathered to assist the Zakka Khel against the Government but their *lashkar* arrived on the scene of operations too late. Once collected, however, they were disinclined to return quietly to their homes, and the immediate outcome was a series of raids committed along the Mohmand-Peshawar border towards the end of March. On the 3rd April, the border posts were slightly reinforced and this gave a pretext to the *mullas* for proclaiming that Government intended to invade the Mohmand country. In order to allay excitement no further reinforcements were sent to the frontier, till news was received that a gathering of 5,000 tribesmen, several of whom had come from Afghan territory, was actually within 20 miles of the Peshawar border. The border villages being in a state of panic, Major-General Sir James Willcocks, the General Officer Commanding, Peshawar Division, reinforced the border posts on the 17th April, at the urgent request of the Political authorities, and, on the 20th April, sent a further reinforcement bringing the total strength on the Michni-Abazai line up to 2,480 infantry, 1 squadron cavalry, with 8 field and 2 mountain guns. On the 21st April, orders were issued for the mobilisation of a punitive force—*vide Appendix B*—of 3 mixed infantry brigades, with divisional troops, under General Willcocks. While the concentration of this force was in progress the Mohmands became more active on the border, but, on the 24th April, Major-General Willcocks attacked them near Shabkadr and drove them back from the foot-hills, inflicting considerable losses on them. Owing to unrest on the Panjkora river, and to active hostilities in the Khyber, two extra brigades were mobilised on the 6th May, and held in readiness on the railway, while General Willcocks temporarily moved his 3rd and part of his 2nd Brigade up the Khyber and dispersed the gathering on that side. On the 13th May the bulk of the Mohmand Field Force advanced up the Gandao Valley from the neighbourhood of Shabkadr, leaving

the 3rd Brigade and part of the divisional troops to secure the line Michni-Abazai. The main body of the force reached Nahakki on the 15th May, and operations were at once commenced against the Khwaizai Mohmands in the Bohai Dag. These operations were carried on for a fortnight and culminated in the destruction of the Koda Khel villages on the 29th May. The expedition was most successful. All the tribesmen through whose territory the force had passed submitted and paid the fines imposed on them, with the exception of the Kandahari Safis and the Koda Khel, and both of these latter had suffered severely.

(101) OPERATIONS IN THE KHYBER, MAY 1908.

While the mobilisation of a punitive force under Major-General Sir James Willcocks, against the Mohmands, was in progress, news was received, on the 25th April, of the gathering of a large mixed *lashkar* in Ningrahar, under the Sufi Sahib of Batikot. The evident intention was to try and divert troops from the Mohmand Border by an attack on the Khyber and to incite the Afridis to rise by preaching *jehad* in Tirah. By the 29th April, affairs were very threatening, and the Khyber Rifles posts on the Loi-Shilman Railway were relieved by regular troops, and orders for the mobilisation of a 4th and eventually of a 5th Brigade were issued. On the 2nd May, a *lashkar* of some 6,000 men advanced into the Khyber, and orders were sent to General Willcocks to reinforce the Khyber garrison. The same day, he moved out his 3rd Brigade from Peshawar,—*vide* Appendix B—together with a squadron of cavalry, 4 field guns and a mountain battery, and, at the same time, sent 2 battalions of infantry and a mountain battery across from the Mohmand border. Throughout the night of the 2nd—3rd May, the post of Michni Kandao was heavily attacked, while heavy firing was directed against Landi Kotal, but the enemy was successfully driven off, the garrison being assisted by a friendly force of Loargai Shinwaris. On 3rd May the force under General Willcocks reached Landi Kotal and attacked the enemy the next morning driving them across the Afghan border with loss. This defeat of the Afghan *lashkar* determined the attitude of the Afridis, and the situation cleared so rapidly that the regular troops were withdrawn on the 7th May, leaving 2 mountain guns at Landi Kotal and a battalion at Jamrud, which latter was withdrawn a week later.

(102) SOMALILAND.

Two companies of Indian troops stationed at Aden were despatched to Las Khorai on the Northern Coast of Somaliland in March 1909 as it was anticipated the Somali Mulla intended to raid the friendly Warsangli tribe located about this port. The companies were withdrawn again at the end of April but the coast was blockaded for some months by the Royal Navy.

His Majesty's Government having decided to evacuate the Somali Hinterland, the Secretary of State for India in 1909 asked for one battalion of Indian Infantry to be sent to Somaliland to replace certain detachments of the King's African Rifles, and effect withdrawal to the coast for purposes of limiting the administration of the country to the occupation of a few important coast towns. The regiment detailed for the duty was the 127th Baluchis which sailed from Bombay on the R. I. M. S. "Hardinge" on 1st December 1909. By the 26th March 1910 the operation of withdrawal was completed without incident, and shortly after the Somali Battalion of the King's African Rifles was disbanded. The 127th Baluchis have accordingly now returned to India.

The troops in Somaliland now consist of 2 companies of the Indian Contingent of the 6th Battalion, King's African Rifles, holding Berbera and Zaila. The friendlies have been provided with arms to protect themselves against hostile incursions. Meanwhile raids and counterraids appear to be the normal state of affairs in the abandoned country.

(103) THE ARMS TRAFFIC AND OPERATIONS FOR TS SUPPRESSION.

This traffic first forced itself on the attention of the British Government during the Afghan War of 1879-1881, when steps were taken to prevent consignments of arms and munitions of war reaching the Persian Gulf from Indian Ports. At the same time in 1881 the Persian Government, realising the dangerous possibilities of the trade as regards their own country, made the importation of arms and ammunition into Persia illegal.

In the following decade the trade grew, though not to any very appreciable extent, the principal merchants being a Persian-Armenian firm and a Parsi-British house ; but the first great impetus to the traffic came through the Brussels Act of 2nd July 1890 which put a stop to the African slave trade and thereby checked the ancillary traffic in arms on the east coast of Africa which had flourished greatly while slavery existed.

The manufacturers and exporters of arms were thus driven to find another outlet for their goods, and it was not long before they found their market in the Persian Gulf. Investigations made by the Government of India showed that these arms were not then penetrating beyond South Baluchistan, the local demand probably absorbing the supply, a fact the significance of which was not lost on either the Persian Government or the Sultan of Maskat, since the former in 1891 reiterated the Shah's edict of 1881 in stringent terms, and the latter issued a proclamation as follows :—

“ Let it be known by this writing that we have forbidden the import into our territory of Gwadur and its dependencies* of arms and ammunition :

* Such as Pishkan.

nothing of the kind is to be landed there or taken thence to any place whatever. Take heed of this, and any one transgressing this prohibition will be liable to punishment. Written and promulgated this 21st Rejeb 1308—3rd March 1891”.

Until 1890 the greater part of the arms reached the Persian Gulf from Zanzibar, but at this time direct shipments from Europe began, not only to Maskat, but to Persian ports, where the trade grew and flourished, in spite of the Shah's prohibition. The quality, too, of the arms changed, and breach-loaders and repeating rifles took the place of muzzle-loaders and cap guns, which were no longer saleable in Arabia or Persia.

At the close of 1896 the volume of trade was so great that the Government of India were again led to investigate the ultimate destination of the quantities of military material pouring into the Gulf, and it was found that 25% of the arms were absorbed by the Turkish possessions in the Gulf, 15% by non Turkish Arabia, and 60% disappeared into Persia, being despatched from Maskat through Bunder Abbas to unknown ulterior destinations.

The Persian Government were thoroughly alarmed at the dimensions which the arms traffic had reached in their territories, in spite of the Shah's proclamation of 1881, and on 11th December 1897, they announced that

orders had been given for stores of arms, &c., to be confiscated, and four days later they agreed that all mercantile vessels trading in the Gulf under the Persian flag might be searched for arms and ammunition by British men-of-war on the condition that any contraband that was found should be seized and handed over to the Persian authorities.

The Persian Government also associated themselves with the British Government in requesting the Sultan of Maskat to warn his subjects of the illegality of the export of arms to Persia, and to authorise British war-vessels to search British, Persian, and Maskat ships in his territorial waters, and to seize and confiscate any cargoes of arms owned by British, Persian or Maskat subjects found on board, if destined for illicit importation into Persia. The Sultan of Maskat agreed to this request and issued a notification and proclamation in the sense required on 13th January 1898.

The result of these measures was that between December 1897 and March 1898 some 5,239 rifles and 1,241,253 rounds of ammunition were seized at Bushire alone, while at Maskat a British steamer coming from Europe was stopped on 24th January 1898, by Her Majesty's Ship "Lapwing" and relieved of 7856 rifles and 7,00,000 rounds of ammunition.

These seizures, joined with the independent action of the Sheikh of Bahrein, who, in January 1898, attached a stock of 2667 rifles and 6,37,500 cartridges belonging to a Parsi firm established there, for the moment paralyzed the arms trade. The Bahrein arms and those taken by H. M's Ship "Lapwing" were the property of the same firm, who were reduced to bankruptcy by their loss, and there is reason to believe that the arms traffic would have been suppressed altogether, but for the arrival of Mons. Goguyer, a French citizen, at Maskat in March 1899. He informed the local native and Indian traders that his operations would be exempt from British interference, as he would export arms purchased from him in native vessels flying the French flag, and so successful was he, that he was followed in 1903 by Messrs. Kevorkoff and Company, and in 1905 by Messrs. Baijeot and Company, both established at Jibuti, in French Somaliland.

As a consequence of Mons. Goguyer's activity the arms traffic recovered from the check it had suffered in 1898, and in the year 1904-05 the number of rifles imported into Maskat was computed at not less than 20,000, despite the fact that (1) by that time the Sultan of Maskat had extended the prohibition of export of arms and ammunition from his territories to the African coast and islands under British protection north of Cape Guardafui, and to Italian possessions on the east coast of Africa, and by Notification dated 17th October 1903, had given British and Italian ships of war power to search suspected Maskat vessels on the high seas and in Maskat territorial waters, any arms found being confiscated to His Highness; (2) the Trucial Chiefs had prohibited the import or export of arms in their territories by Notifications of 24th, 25th, and 26th November 1902; (3) the Sheikhs of Bahrein and Koweit had prohibited the traffic in their countries and empowered British and Persian ships of war to search Bahrein and Koweit vessels in British, Persian Bahrein or Koweit territorial waters respectively in 30th April 1898 and 24th May 1900; (4) throughout the whole littoral of the Persian Gulf—with the exception of El Katr—as well as throughout India and the coast of Africa as far as Jibuti, traffic in arms was illegal and contraband.

Evidence of the further marked growth in the arms traffic in the Persian Gulf is afforded by a comparison of the value of the imports into Maskat in the last two years. In 1905-06 the value of this trade was 11 lakhs, whereas, for 1906-07, it was estimated at 20 lakhs. In the course of 1906 it became clear that Koweit had developed into an *entrepot* for an extensive trade in arms with Arabia. Towards the end of that year 1,000 rifles were arriving weekly at Koweit, a figure which was raised to 4,000 during some weeks of 1907. In February 1907, the Government of India submitted to the Home Government certain proposals for the suppression of the Maskat arms trade. At the end of the following month the Secretary of State replied that the moment was not opportune for making representations to other powers concerned, and that the better course would be to collect information in support of such recommendations as the Government of India might wish to bring before the Arms Conference which assembled at Brussels early in 1908. Major Grey, His Britannic Majesty's Consul at Maskat, and Commander Bowman, R.N., were delegated to represent the Government of India at the Conference.

In this connection mention may be made of the Tripartite agreement concluded in December 1906, between France, Italy and Great Britain whereby these powers undertake to exercise control over the arms traffic in the Red Sea, which has its head-quarters at Jibuti.

Throughout the year 1907-08, large consignments of arms were landed at frequent intervals on the Makran Coast from Maskat. Towards the end of 1907 the matter had become so serious, having regard to the ultimate destination of these rifles in Afghanistan and among the tribes of the North-West Frontier of India, that the Government of India decided to adopt preventive measures, which included the establishment of coast patrols from Jashk to Chahbar, by guards of the Indo-European Telegraph Department, in telephone communication with the telegraph stations along the coast. During the whole of this period Maskat continued to be the arms emporium of the Middle East. It was also reported that arms were being sent from this port to the Somaliland Mullah.

In the beginning of 1908 the Sultan of Maskat issued an order that no Afghans were to be allowed to land at Maskat. This order has been enforced with the assistance of the British Consul and the Naval Authorities.

Towards the end of March 1908 the condition of affairs became critical as it was reported that large bodies of Afghans were assembled on the Makran coast, and more particularly in the neighbourhood of Jashk. It was stated that these men intended to escort the arms caravans in such force as to obviate any chance of a recurrence of the capture of a convoy, as happened in the past year. They also were reported to have expressed their intention of revenging themselves on the British telegraph station at Jashk if the British gun-boats should capture any of the arms coming over from Maskat. In the middle of April the "Proserpine" made a capture of a dhow containing a large number of rifles and ammunition. Several dhows were overhauled and, and on one occasion, a skirmish took place with Afghans on the Persian coast, in which two British sailors lost their lives. Thereupon the detachment at Jashk was reinforced by a British Officer and 50 sepoys to ensure the safety of the British Telegraph officials.

The Arms Traffic between Maskat and the Makran Coast continued to flourish during 1908-09; and though two naval successes in March 1909

resulted in the capture of some 1,500 rifles and possibly deterred operations for a time, there appears little doubt that anxiety as to the outcome of the Arms Conference held in Brussels acted as an incentive to greater energy in gun-running than at any previous period.

The Brussels Arms Conference held its last sitting in December 1909. No decision was arrived at on the subject of Maskat and the neighbouring countries.

Great activity was shown in the autumn of 1909 by the arms traders, especially by the Afghans. The usual *modus operandi* of the latter was to arrange the purchase and despatch of arms from Maskat to Persian soil through certain Baluch and Persian chiefs of the Makran coast. On arrival the arms were transported a short distance inland to convenient depôts formed at certain points, whence they were removed, as opportunity offered, to Afghanistan.

As the trade had assumed such alarming proportions, and as a large part of the arms found their way into the tribesmen on the North-West Frontier of India, proposals were put forward in the autumn of 1909 for its suppression by an active naval and military blockade. The measures taken comprised :—

- (a) The employment of four of His Majesty's cruisers and other ships, with a number of launches, etc., for in-shore work.
- (b) The employment of a striking force of, approximately, half a battalion Indian Infantry, with two mountain guns, and a section of Sappers and Miners. These were despatched in January 1910, on R. I. M. S. "Hardinge," for service in the Gulf and were withdrawn in April.
- (c) The appointment of a General Staff officer at Jashk for Intelligence work.
- (d) The erection of a wireless station at Jashk for communicating information to His Majesty's Ships patrolling to intercept dhows.
- (e) The reinforcement of the guard at Jashk to 135 men and of that at Chahbar to 115 men. Both of these places were put in a state of defence and were provided with 2 machine guns each.
- (f) A police officer of the Criminal Intelligence Department was detailed to effect measures to stop the passage of arms traders to the Gulf *via* India. Some men were arrested and this avenue of approach to Maskat is practically closed to the Afghans.
- (g) The despatch of $\frac{1}{2}$ battalion Indian infantry and 2 machine guns to Robat. This detachment is still at Robat.

As some of the men of the Consular escort at Bandar Abbas were implicated in the arms traffic, they were relieved by men from another regiment.

Owing to the threatening attitude and the numbers of the Afghans in the vicinity of Bandar Abbas, the escort there was increased at the beginning of 1910, but was reduced to its normal strength in June.

These arrangements attained a large measure of success. Considerable captures were made by His Majesty's ships at sea. On three occasions naval and military forces landed and destroyed depôts of arms. The results may

best be judged by the following figures which are approximate only, especially in the case of "Departures from Maskat." They embrace the whole period under review in this publication.

Reported departure from Maskat and Matrah.

For					Arms.	Ammunition.
Makran	...	...	...	...	41,578	4,400,900
Koweit	...	...	...	...	8,620	802,000
Other places (unspecified)	...	...	...	...	7,298	896,500
Total					57,496	6,159,400

Reported landings in Persia and Makran—arms, 20,476, ammunition, 1,884,400. Of these only some 3,920 arms and 388,400 rounds of ammunition have been landed since 1st January 1910 when the blockade commenced in earnest.

Arms captured, confiscated, etc.

		Rifles.	Pistols.	Rifle Ammunition.	Pistol Ammunition.
Captured on land	...	2,960	...	329,500	...
Captured at sea	...	8,520	214	1,764,500	2,600
Jettisoned	...	587	...	5,000	...
Confiscated	...	41	3	5,560	960
Blockade total	...	12,108	217	2,104,560	3,560
Confiscated by :—					
Shaikh of Koweit	...	301	...	30,100	...
Shaikh of Dibai	...	...	...	3,960	...
Total	...	12,409	217	2,138,620	3,560

The Afghans have suffered considerable losses and incurred increased expenditure. The India route was closed to them, as was Seistan. In addition, they fell out with the local tribes of Biyaban and though little damage was done, the fact did not add to their comfort. A prisoner stated that the Afridis also had felt the operations so severely that they would not come again to the coast for arms; other reports say that 2,000 Afghans will return about September or October 1910 and that efforts will be made to run arms by a new route further west, towards Baghdad.

The Admiral has now submitted a scheme for continuing the operations till the end of November but on a somewhat smaller scale, and the sanction of the Secretary of State has been asked to this. A prolongation up to the end of March 1911 is also under consideration. The question of conducting operations against the traders by a small mobile force from Robat, in addition to the naval operations, is receiving attention; and a scheme is being worked out by the General Staff. Mr. Merk has reported that owing to the serious losses sustained by the tribesmen on the North-West Frontier who are engaged in the arms trade, a feeling of exasperation prevails in their midst, which may lead them to acts of hostility.

(104) RISING IN THE MANDI STATE.

In May 1909, a rising took place in the Mandi State, Punjab, and 2 companies of the 32nd Sikh Pioneers were sent from Simla to Mandi to restore order. The local excitement rapidly subsided and the detachment was recalled to Simla at the beginning of June 1909.

(105) DISTURBANCES IN THE BASTAR STATE.

In February 1910, an outbreak occurred among the aboriginal tribes of the Bastar State in the Central Provinces, the result of intrigues among the State officials. As the rising threatened to assume serious proportions, 2 companies of the 22nd Punjabis were despatched from Jubbulpore to co-operate with the police. No serious resistance was met with and the detachment was withdrawn at the end of April. There were no casualties among the troops.

(106) GYANTSE RELIEF FORCE, 1910.

As the outcome of the policy of His Majesty's Government to evacuate Tibet, to recognise the suzerainty of China over the country, and to abstain from all intervention in her internal affairs, the Chinese Government, ever since our withdrawal, have made efforts to consolidate their position, political and military, in Tibet. In the furtherance of these efforts, the Chinese have come into armed conflict with the Tibetans, with the result that in 1909 the Dalai Lama was forced to flee from Lhassa and to seek an asylum in India. The political situation in Tibet will no doubt be fully narrated by the Foreign Department in their summary. Suffice it to say that in view of the unrest and turmoil created by the efforts of the Chinese to make effective their control over Tibet, there has arisen the probability that our trade agents and their small escorts might be in very serious danger through the exasperated feelings which have been aroused both in the Chinese and the Tibetans; more especially as those feelings cannot be kept in check owing to the absence of any effective government in the country.

In pursuance of the avowed policy of His Majesty's Government not to interfere in the internal affairs of Tibet, it has been decided that we cannot adjudicate as between China and Tibet; but in order to protect the lives of our trade agents and their escorts, should the turmoil in the country become so marked as to need such protection, it has been decided to hold a small mobile force in readiness, with base at Silliguri, which shall make a dash for Gyantse and withdraw to India our officers and their escorts. The force, consists of the following units.

32nd Mountain Battery (less one section).

No. 1 Company, 1st Sappers and Miners.

2nd Battalion, 10th Gurkhas.

48th Pioneers.

No. 172 Indian Field Hospital.

Ordnance Field Park from Fort William.

No. 8 Field Medical Store Depôt.

Section No. 11 Field Veterinary Hospital.

together with transport details including a Bullock train and a Coolie Corps.

While the necessary preliminary movements and collection of supplies were in progress the situation in Tibet greatly improved, no doubt as the result of our military preparations becoming known both at Pekin and at Lhassa. Simultaneously serious breaches occurred on the railway line to Silliguri, owing to floods. It was accordingly decided to stay further preparations, pending a review of the improved situation ; and His Majesty's Government have now decided that preparations should be discontinued, but the troops to be still under warning.

(107) THE AFFAIR AT LAKKI.

Information having been received, on the 11th March 1910, that a gang of 32 raiders (Mahsuds) were in the village of Pahar Khel near Lakki and about 28 miles distant from Bannu, a party of Border Military Police under Captain Harris started at once, and on reaching the village was joined there by the Superintendent of Police with 25 policemen. The mosque in which the raiders were was at once surrounded. The General Officer Commanding, Bannu Brigade, who had been asked for troops, despatched two squadrons of cavalry and 150 rifles, under Major Swanston, 14th Lancers. The troops reached Banda Ayaz Khan about 7 P.M. and surrounded the mosque. About 9 P.M. the raiders suddenly charged from the mosque, and, under cover of darkness, a number of them succeeded in making good their escape. The following were the casualties on both sides.—8 raiders killed including Kamal (a Sheikh of the Mulla Powindah), 3 wounded and captured and 6 wounded. One officer (Captain Stirling, 57th Rifles) and 5 men, 57th Rifles, killed and 10 wounded, of whom one subsequently died, and 3 men of the 14th Lancers wounded.

(108) AFFAIR NEAR PESHAWAR.

News having been received of the presence of the outlaw Multan and his gang in the vicinity of Peshawar on the 23rd January 1909, a force consisting of the 19th Lancers, under Colonel Biddulph, with a double company, 59th Rifles, formed a cordon to surround the gang. In the fight which ensued Multan and one of his men were shot dead. Seven of the raiders eventually surrendered and two escaped. The seven men who were captured and the man who was killed with Multan, were Sangu Khel Shinwaris of Afghanistan. The two men who escaped were Peshawari outlaws. Two British officers were wounded and three men of the 19th Lancers were killed and three wounded.

(109) MENGAL AFFAIRS (KALAT).

Owing to the mismanagement of tribal affairs by Sardar Shakar Khan, Chief of the Mengal tribe, it was decided on the 19th July 1908, by the

Sarawan and Jhalawan tribes that the Chiefship should be transferred to Haji Ibrahim Khan. The followers of the old Chief opposed the installation of the new Chief. Disturbances ensued. A force of 200 infantry was, at the request of the Jam of Las Bela, ordered to proceed to Las Bela. At the same time a force of 300 infantry, 2 guns and a squadron of cavalry was ordered to proceed from Quetta to Kalat.

Early in September, in compliance with a request from the Political Agent, Kalat, for more troops to be sent to Kalat, in case of accidents, as a support for the column accompanying him to Wadh, the despatch of an additional force of 500 infantry and 2 guns from Quetta to Kalat was arranged for.

The rebel leaders having come in, they were, at the request of the new Chief, pardoned, and, on the 8th October 1908 the new Chief was publicly proclaimed Sardar of the Mengal tribe.

All the troops returned to their respective stations by the 14th November 1908.

(110) THE PIENMA AND HKAMPTI LONG PUNITIVE EXPEDITIONS.

At the close of 1909, an armed raid was committed by the Chinese tribal Chief of Teng Keng on the Upper Salween, into the unadministered tract of country west of the Irrawaddy-Salween watershed, which has been claimed by the British Government as their territory since many years past. Subsequent enquiry showed that this was not a mere raid by uncontrolled tribesmen but an expedition undertaken under the orders of responsible Chinese officials, which was followed up by acts pointing to a desire for the permanent occupation of the tract by the Chinese. It has accordingly been decided that the claim of the British Government that the Salween-Irrawaddy watershed is the correct and recognised frontier between Burma and China in that region, should be effectively asserted and, for this purpose, Mr. Hertz, Deputy Commissioner of Myitkyina, has been selected to proceed there in November next with an escort of 450 Military Police armed with .303 rifles, with the object of bringing the tract under direct British administration by removing all boundary pillars and other traces of Chinese occupation, settling disputes between villages, levying a nominal tribute, etc., etc.

Similar instances of a Chinese forward policy, in direct defiance of the formal claim of the British Government to regard the Irrawaddy-Salween watershed up to the confines of Tibet as the frontier between Burma and China, having occurred in the Shan State of Hkampti Long, which was more than once visited by a Chinese officer with an armed escort with the avowed intention of establishing themselves there, it has also been decided to send another civil officer, Mr. Barnard, Extra Assistant Commissioner, to that part of the frontier in December 1910 with an armed escort of 125 Military Police, for the purpose of presenting a *sanad* to the Lokkum Sawbwa, Saonwe Nu, who has always acknowledged the British suzerainty, as evidence of his subordination to the British Government and to confirm him in his succession of the Sawbwaship and also to proclaim the suzerainty of Great Britain over the whole of the Hkampti Valley.

CHAPTER VI.

DISTRIBUTION OF THE ARMY.

(111) ROBAT GARRISON.

In 1905-06 owing to the political situation in Persia, it was decided to keep a reserve of arms stored in the Consulates at Seistan and Meshed, and a double company of the 128th Pioneers was accordingly ordered to escort the arms to Robat, whence they were duly forwarded to their destinations as opportunity offered. Owing to a plague riot in Seistan the double company was retained in the vicinity of the frontier in case they should be required for the protection of the Seistan Consulate. The disturbed condition of Persia also rendered such continuance necessary. Owing to the double company of the 128th Pioneers having suffered severely from sickness, they were relieved at Robat in February 1907 by a double company of the 127th Baluchis. This latter detachment rendered good service during the month of May 1907 by arresting a caravan conveying arms from the Persian Gulf to Afghanistan.

Though originally sent to Robat for a temporary duty, *viz.*, to escort a consignment of arms, the Political situation in Persia, as also the necessity to check the traffic in arms between the Persian Gulf and Afghanistan, rendered the continued retention of the garrison of Robat very desirable. It was further reinforced in 1908 by 500 rifles of the 126th and 127th Infantry on account of the apprehended incursion of a strong arms caravan from the Persian littoral. It has now been decided to maintain the garrison at a strength of half a battalion during the progress of the operations for the suppression of the arms traffic, but to relieve the existing garrison in October 1910. It is probable that operations against the traders will be undertaken by a mobile force from Robat.

(112) INCREASE TO THE GARRISON OF BANNU.

In furtherance of the Redistribution Scheme, and to ensure rapid and effective operations in support of the militia in the Tochi, the addition of a third battalion of Indian Infantry to the garrison of Bannu was considered to be most desirable. Accordingly in June 1909 the sanction of the Secretary of State was asked to this being done, and to the provision of the necessary accommodation at the cost of Rs. 2,43,109. The sanction of the Secretary of State was received in July of the same year. In September 1909 the question was further discussed by the Advisory Council, in order to provide the necessary moveable column, and to lessen the duties of the troops, which are heavy in the hot weather. It was however decided not to move an additional battalion to Bannu until complete arrangements for accommodation for both officers and men had been made, which was dependent on when funds became available. The matter was accordingly in abeyance; but in April 1910 the General Officer Commanding Bannu Brigade pointed out the impossibility of the moveable column marching out without dangerously denuding the garrison of Bannu, and urged the early addition of a third battalion. He pointed out that pending completion of the necessary accommodation the officers and troops could be temporarily located at a small expense in a suitable way; and

the Government of Madras have been asked (August 1910) to agree to a battalion of Indian Infantry being withdrawn from Bellary for location at Bannu. The necessity for the permanent addition of an extra Battalion of Indian Infantry at Bannu has not however yet been definitely accepted by the Commander-in-Chief; but the Secretary of State has been asked to agree to the immediate provision of temporary accommodation.

(113) WITHDRAWAL OF TROOPS FROM THE ADEN HINTERLAND.

In May 1906 His Majesty's Government set forth their future policy in regard to the Aden Protectorate. The fundamental principles of that policy are that, while the security of Aden must be a standing object of the national care the Government has no desire to interfere in the internal affairs of the tribes outside the limits of British India and that portion of the Protectorate which corresponds to the 10-mile limit of the Somali Coast. The immediate withdrawal of the troops from D'thala was a necessary consequence of this policy. On the 9th August the Government of India submitted a despatch in which they enumerated their objections to this reversal of policy, and suggested that the Home Government should take over the administration of Aden. Two days earlier the British Minister at Constantinople drew attention to the danger of withdrawal at a time when the Yemen was so disturbed. In October the Secretary of State, replying to the representations of the Government of India, renewed his earlier instructions and added that the question of the transfer of Aden to the Home Government must await the return of its administration to a normal basis. Orders for the withdrawal of the Hinterland garrison were issued on the 1st December, and by the second week of January 1907 all the troops had returned to Aden, except the Political Officer's escort at D'thala of 155 men with 2 machine-guns, and the posts, totalling 285 men, left on the road from Aden to D'thala. Almost immediately disturbances broke out in various parts of the Hinterland. Of these, the most serious occurred on the D'thala plateau where desultory operations between the Amir and his refractory subjects, the Jihafi and Shairi tribes, continued from mid-December 1906 to the following February.

The Political Officer and his escort continued at D'thala till October 1907, when the Hinterland was completely evacuated. This resulted in the recrudescence of further petty hostilities between various tribes, acts of looting and the transfer of their allegiance by some of the tribes to the Turks, to whose intervention our evacuation was ascribed.

(114-115) EMPLOYMENT OF INDIAN INFANTRY BATTALIONS IN MAURITIUS AND CEYLON.

The Secretary of State, in Military (Secret) Despatch No. 94, dated 17th August 1906, informed the Government of India that it had been decided that no Indian Infantry would be required in future for the garrison of Mauritius, but that it was considered desirable to substitute one Indian for the British Infantry battalion quartered in Ceylon. The Government of India agreed to this latter proposal as a temporary measure, in their telegram to the Secretary of State of the 15th October, 1906. The Indian Infantry were accordingly withdrawn from Mauritius to India and a regiment sent to Ceylon, during the 1906-07 relief season.

(116) THE CHUMBI VALLEY.

The third and last instalment of the Tibetan indemnity was paid by the Tsarong Shape to the Government of India on the 27th January 1908, and the troops in occupation were withdrawn from the Chumbi Valley on the 8th February 1908. A detachment of 2 British Officers and 82 men were left at Gyantse as an Escort to the Trade Agent at that place, and a smaller detachment at Yatung.

(117) EASTERN BENGAL AND ASSAM.

It has been decided that for the present, a force of $1\frac{3}{4}$ battalions of Indian Infantry should be retained in the province and stationed as follows :—

$\frac{1}{2}$	Battalion at Manipur.
$\frac{1}{2}$	„ „ Dibrugarh.
$\frac{1}{2}$	„ „ Shillong.
$\frac{1}{2}$	„ „ Dacca.

In connection with the garrison for Assam, it is necessary to explain that the withdrawal of a Battalion of Indian Infantry therefrom was proposed in the Redistribution Scheme, and agreed to by the local Government provided it was replaced by 340 military police. The withdrawal of the Battalion was proposed on the following grounds, *viz.*, (1) it was split up into small detachments which militated against its military efficiency and discipline, (2) it was being wasted on purely police work which could be better done by police proper, (3) it was situated at a great distance from the main centres of disaffection in the province, and that troops could more readily be had for Eastern Bengal and Assam from Fyzabad and Lucknow, (4) that for strategical and internal defence purposes it was more usefully placed at Fyzabad where it would help to complete the Brigade, and (5) that it would be well placed in Oudh, an important danger-zone, and could at the same time be easily moved to Eastern Bengal and Assam itself in case of need. In view however of the more recent proposal to locate two Battalions of Gurkhas at Darjeeling, it has been decided not to withdraw one Indian Infantry Battalion from Assam to Fyzabad, till the Gurkhas have actually been located at the former place, when the question will be reconsidered in all its bearings.

(118) TRANSFER OF SIX COMPANIES OF INDIAN INFANTRY FROM DEESA TO RAJKOT.

Under the Redistribution Scheme it was originally proposed that the 2 companies of Indian Infantry at Rajkot should join their head-quarters at Deesa, and that Rajkot should cease to be a military station, Deesa being retained with a garrison of one complete Indian regiment. This proposal did not commend itself to the Bombay Government, but they were prepared to agree provided improved and augmented police arrangements were sanctioned for the treasury and jail at Rajkot. Subsequently, however, the Government of Bombay modified their opinion and were prepared to agree to the garrison at Deesa, being altogether withdrawn, if a whole battalion could be stationed at Rajkot. As this proposal had various advantages, both political and military, it was recommended to the Secretary of State, in 1910, who has sanctioned the transfer of the 6 companies of Indian Infantry at Deesa to Rajkot, involving an expenditure of Rs. 1,30,000 for lines.

(119) WITHDRAWAL OF TROOPS FROM SHAHJAHANPUR.

In May 1910 the Secretary of State was addressed on the subject of the permanent withdrawal of troops from Shahjahanpur in furtherance of the Redistribution Scheme.

The garrison of Shahjahanpur during the summer consisted of two companies of British Infantry, the other six being located with their head-quarters at Chauhattia. In the winter, the whole battalion was located at Shahjahanpur. It was proposed that the whole battalion should remain at Chauhattia during the summer but that it be moved to Bareilly, instead of to Shahjahanpur, for training during the winter. This arrangement will not reduce the number of troops in the Rohilkhand Division of the United Provinces and, whilst maintaining them concentrated for use as required, will be very beneficial for the training and efficiency of the troops. The proposal involves a substantial saving. The Local Government concurred in the evacuation of Shahjahanpur as a military station, and the Secretary of State's sanction thereto having been received in June 1910, the arrangement has been carried out accordingly.

(120) WITHDRAWAL OF A BATTALION OF BRITISH INFANTRY FROM BURMA TO INDIA.

In July 1910 the Secretary of State was addressed on the subject of the withdrawal of one battalion of British Infantry from the present garrison of Burma and its location in India. The desirability of so withdrawing a battalion from Burma had been recognised for some years past and the proposal to do so was incorporated in the Redistribution Scheme.

In our Secret Despatch No. 138 of the 29th September 1904, when submitting the schemes for the Redistribution of the Army in India and its preparation for War, the Secretary of State was informed that whilst the Government of Burma concurred in the Redistribution Scheme, His Honour the Lieutenant-Governor felt some hesitation in accepting the proposed reduction of the British Infantry in time of peace from four battalions to three; but after fully considering the case the Government of India were of opinion that the reduction should be carried out. No action was, however, taken at the time, as other more important measures had to be effected, and the necessary accommodation for the battalion had to be constructed. As circumstances render it desirable that the battalion should now be located in India proper, the Local Government in accordance with the instructions contained in Secretary of State's despatch No. 184 of the 8th November 1907, were asked for their opinion.

Sir Herbert White, in demurring to the withdrawal of the battalion, based his objections on three grounds, *viz* :—

- (i) The extent of country to be guarded and the backward nature of the communications;
- (ii) The possibility of political complications with China; and
- (iii) The risk to be expected from seditious combinations.

These objections were exhaustively considered by the Government of India in their despatch No. 72 of 1910, and it was pointed out to the Secretary of

State that the needs of India, both military and political, were in this matter of greater urgency and importance than those of Burma. It was shown that in proportion both to population and area, Burma had a larger proportion of British troops than India; that complications with China were an Imperial and not local concern; and that risks from seditious combinations had to be guarded against much more in India than in Burma, where such risks were comparatively small.

The distribution of the British Infantry remaining in Burma will be as follows :—

Rangoon and Port Blair	...	...	... One battalion.
Maymyo and Mandalay	...	...	... One battalion.
Meiktila, Shwebo and Bhamo	...	...	... One battalion.

The Secretary of State's sanction to these proposals has been received, and will be given effect to during the course of the 1910-11 relief season.

(121) ADDITION OF A BRITISH INFANTRY BATTALION WITHDRAWN FROM RANIKHET AND SITAPUR TO THE GARRISON OF QUETTA.

In furtherance of the Redistribution Scheme the Secretary of State for India, in May 1909, sanctioned the withdrawal, during the relief season, 1909-10, of the battalion of British Infantry divided between Sitapur and Ranikhet, for location in the new British Infantry barracks at Quetta, which were then nearing completion. The battalion arrived there during November 1909.

(122) LOCATION OF 2 GURKHA BATTALIONS AT DARJEELING.

The question of the most suitable location for the 1st and 2nd Battalions of the 10th Gurkhas has for some time been under consideration. It was originally intended to place them at Quetta, but in deference to the opinion of the Secretary of State, further additions to the garrison of that place have been deferred. After an exhaustive consideration of all the conditions and requirements to be met, it was decided to locate the two Battalions at Darjeeling (Takdah). The advantages offered by Darjeeling are that in view of the unrest in the two Bengals it was advisable to have more troops in the area, and the addition of two Battalions would complete a field army brigade in the Presidency Brigade. The Secretary of State at first demurred to Darjeeling in view of the political objections to stationing troops on the Tibetan frontier, which might afford a pretext to China to move troops towards that frontier as a counter move; but on its being explained to the Secretary of State that the location of the two battalions at Darjeeling had been decided on before the present situation in Tibet had arisen, he has given his tentative sanction to lines for one Battalion being commenced; but no movement of troops is to be made without his specific sanction. Meanwhile a difficulty arose owing to two important Calcutta merchant Houses having large tea gardens in the vicinity, submitting a memorial against the location of troops on the site elected, as interfering with the tea industry. Their representations have been fully considered, and it has been decided that they do not justify the rejection of the original site, which had been most carefully selected. Lines for one battalion will shortly be commenced.

(122-A) WITHDRAWAL OF THE INDIAN CAVALRY REGIMENT FROM JACOBABAD.

The question of withdrawing the regiment of Indian Cavalry from Jacobabad, which was originally suggested several years ago, has now (October 1910) again been raised. Owing to its unhealthiness, to the lack of a good water supply, to difficulties in the way of combined training etc., Jacobabad is generally regarded as no longer suitable for the location of a Cavalry regiment. No decision has yet been arrived at, but it is probable that the regiment if withdrawn will be stationed at Lucknow.

CHAPTER VII.

THE MILITARY SITUATION ON THE NORTH-WEST FRONTIER.

(123) 1905-06.

The military situation on the North-West Frontier when Lord Minto assumed office in November 1905 was briefly as follows—

The policy initiated by Lord Elgin's Government and continued by Lord Curzon of withdrawing regular troops within the administrative border and controlling the principal valleys in tribal territory with local militia, had to a great extent been carried out. In the North-West Frontier Province, Chitral, the Malakand, Chakdara, and the Samana were the only trans-border stations occupied by regulars; and in Baluchistan, the garrison of Fort Sandeman had been reduced by the withdrawal of the cavalry regiment.

The Khyber, Kurram, Tochi, Gomal, and Zhob Valleys were held by Militia Corps, commanded by selected British officers, and these troops had attained a high level of efficiency. As a general rule, they were entirely, or largely, composed of men of the tribes residing near the valleys they held, but the Southern Waziristan Militia was an exception to the rule.

In Dir, Swat, Gilgit, and the Baluchistan Agency there were local levies, variously armed and trained. In Chitral a corps of scouts had been raised and armed with Lee Metford rifles, but as they were intended for external rather than internal defence, they stood on a different footing to the other irregular forces.

The regular troops stationed on the frontier consisted of the 1st (Peshawar) and 4th (Quetta) Divisions, with the Kohat, Bannu, and Derajat Brigades. At Nowshera, Peshawar, Kohat, Bannu, Dera Ismail Khan, and Quetta, moveable columns were kept in readiness to support the Militia or police when required.

On the 9th April 1906 a serious raid was committed on the village of Tangi, near Abazai. The raiders got away with a considerable amount of booty. It was thought possible that other raids might be attempted in the same neighbourhood, and accordingly a squadron of Guides Cavalry were located at Abazai and one of the 21st Cavalry at Shabkadr.

(124) 1906-07.

The sole remaining Mahsud Company of the Southern Waziristan Militia was disbanded in October, 1906, as the tribe repudiated responsibility for the conduct of the sepoys.

The regular garrisons of Abazai and Shabkadr were maintained, but their composition was altered so as to consist mainly of infantry.

Raids on the Peshawar border, committed generally by Zakha Khel Afridis, were frequent.

The doubling of the Khyber road was completed, with the exception of some rock-cutting near Fort Maude. The work on the railway north of the Khyber was continued. The railway bridge over the Indus at Khushalgarh

approached completion, and the broad gauge line on the further bank was laid for a few miles.

(125) 1907-08.

The year was marked by a considerable amount of unrest throughout the fringe of semi-dependent tribes situated between India and Afghanistan. Inter-tribal affrays, raids across the Durand Line, and raids into British territory have been more frequent than usual.

South of the Kabul river the Afridis indulged in inter-faction fighting to an abnormal extent. The Zakka Khel, who alone gave cause of annoyance to Government, continued to add to a long list of offences. At length it was decided to send an expedition into the Bazaar valley. The force, consisting of two brigades, crossed the administrative border on the 15th February 1908 and visited the entire valley. After a satisfactory settlement had been arrived at the force was withdrawn across the border on the 29th February. The noteworthy features of this expedition were the successful isolation of the Zakka Khel from other sections of the Afridis, and the attempt of some *mullas* and others on the Afghan side of the border to convert the trouble into a pretext for a general *jehad*. Their efforts were responsible for the gathering of the Mohmands as mentioned below, and also for the attack by a *lashkar* of Afghan subjects on the forts of Michni Kandao and Landi Kotal on the 2nd May. This *lashkar* was driven off without difficulty and was dispersed on the arrival of reinforcements on the 4th May.

North of the Kabul river tribal fighting in Dir and Bajaur was almost incessant, but did not, however, disturb the annual passage of the Chitral relief. South of Bajaur the Mohmands, committed a series of raids. Finally they collected in large numbers on the border and assumed so threatening an attitude that the concentration of a Field Force on the frontier was ordered towards the end of April 1908. The gathering was dispersed on the 24th April after a sharp action near Matta Moghal Khel.

In Waziristan the Mahsuds added to a long list of offences against Government. On the 22nd March 1908 their brutal murder of a political *Muharrir* and a servant of the Political Agent was effectively punished by a successful seizure of all Mahsuds and property found within British limits.

South of the Gumal river there were a few raids in the Zhob Agency, but nothing serious has occurred to disturb the peace.

Work was continued on the Loi-Shilman railway until the end of April, when it was temporarily suspended owing to the frontier troubles.

The bridge over the Indus at Khushalgarh, and the broad gauge railway to Kohat were finally opened for traffic in January 1908.

The bridge over the Gumal river at Murtaza on the Tank-Wana road was also finished.

Work was commenced on the Upper Swat canal.

(126) 1908-09.

In April 1909 it was found necessary to reinforce the posts on the frontier in the Lower Tochi and at the mouth of the Gomal and Takki Zam and to push up more regular troops to support the lines of communications.

Two British officers fell victims to fanatical outrages, Lieutenant Macaulay, R.E., in the Miranzai valley, and Mr. MacDonald of the Survey in Shiranni country. A native Surveyor, Yakub Ali, was also killed close to Shiranni country in the Dera Ismail Khan district.

A fanatical attack was also made by a Darwesh Khel sepoy upon Captain Keene of the North Waziristan Militia, who fortunately escaped with a severe wound.

Construction work on the railway north of the Khyber was temporarily stopped until funds are available.

The conversion to broad gauge of the Kohat-Thal railway could not be carried beyond Kohat, pending orders from the Secretary of State for India.

(127) 1909-10.

Construction work on the Railway north of the Khyber was still held in abeyance.

Pending the resumption of the broad gauge conversion from Kohat to Thal, and its eventual extension up the Kurram, instructions were issued to the North-Western Railway to improve the carrying power of the present line by the provision of heavier rails and improved type of rolling stock as opportunity offers.

Owing to lack of funds there was little or no improvement to road communications Trans-Indus.

The most serious feature of the conditions prevailing along the North-West Frontier has been the continuance of raids in British territory, the chief offenders being the Jajis and Khostwals from across the Afghan border, the Shirannis and Mahsuds.

There can be no doubt that the large influx of rifles from the Gulf during the gun running season of 1908-09 into the Afghan districts of Khost and Ningrahar is in a great measure responsible for the disordered condition obtaining in these districts generally, and in particular for the continuous raiding carried out from Khost, a district that has now become the chief rallying point for outlaws from our side of the border. In Waziristan many raids are directly traceable to the instigation of the Mulla Powindah.

The total number of raids between 1st June 1909 and July 25th 1910 has amounted to 192, of which the majority have taken place in Waziristan and in the Bannu and Dera Ismail Khan districts, though raiding has been general even so far west as the Khwaja Amran and Peshin.

On 1st June 1909, Captain Graves, R.E., was attacked by 30 raiders in the Shinkai Tangi and severely wounded. On 11th March 1910 a party of 32 Mahsuds under a Sheikh of the Mulla Powindah, was surrounded near Laki by a cordon of Border Police and troops from Bannu, but broke through, after dark and though pursued by cavalry, made good their escape with a loss of 17 men; our casualties amounted to Captain Stirling, 57th Rifles, and 4 men killed and 12 wounded. Among other daring raids may be mentioned that of Mahsuds and outlaws from Khost on a Militia picquet below Khajuri on 10th

July 1909, in which 7 sepoys were killed and a havildar wounded ; the raid of some 1,000 Jajis from Jaji Maidan into Kurram, near Ghazi-patta, on 4th May 1910 ; and that carried out by Shirannis on Vihowa, Dera Ghazi Khan district, on the 18th June 1910. On June 23rd 1910 Captain Anderson, 130th Baluchis successfully intercepted a notorious gang of Afghan raiders near Chaman.

At the beginning of June 1909 the old standing feud between the Afghans and the Turis over the construction of a dam across the Kurram at Kharlachi assumed larger dimensions than usual. A considerable Afghan *lashkar* collected in the neighbourhood of Patan just across the border and it was found necessary temporarily to reinforce Kharlachi Post by a detachment of the Kurram Militia with two guns from Parachinar. There was a good deal of firing at long ranges which did little or no harm and gradually the excitement died down.

As the inferiority in ranging power of the weapons carried by our frontier irregular corps, in comparison with those in possession of Afghans and independent tribesmen, has now been amply demonstrated in the collisions that from time to time take place between them, it is satisfactory to know that all frontier militias as well as the Zhob Levy Corps will shortly be re-armed with single shot '303 rifles.

In March 1910, the coincidence of the Muharram observances and the festival of the Holi gave rise to considerable disturbances between the Muhammadans and Hindus in Peshawar. A great number of Hindu shops were broken into and looted, there being some casualties on either side, and it was found necessary to summon troops from the cantonment to patrol the city. When quiet was restored the civil authorities were able to arrange for the restoration of most of the property pillaged.

Owing to the serious losses sustained by tribesmen engaged in the arms trade, owing to our operations for the suppression of the Arms Traffic in the Persian Gulf, a feeling of exasperation exists on the frontier ; and Mr. Merk has reported (September 1910) that the Jirgas of the clans most severely affected admit their inability to control the malcontents, whose intentions are openly and avowedly hostile.

CHAPTER VIII.

MILITARY INTELLIGENCE.

RUSSIA-IN-ASIA.

(128) 1905-06.

During the earlier part of the period under review the condition of affairs in Russian Central Asia was very disturbed. Revolutionary outbreaks and breaches of discipline amongst the troops were of frequent occurrence, but were spasmodic and not on a very large scale. The general situation gradually improved though the revolutionary spirit in the country was not finally stamped out.

No important military measures, in the matter of increase of military force, were reported during the period, and Russian garrisons remained normal.

The Orenburg-Tashkent Railway began regularly conveying recruits and time-expired men to and from Russian Central Asian garrisons.

The Governor-General of Russian Turkistan died on 14th December 1905 and was succeeded by General Subotich. The latter is credited with "Forward" views and his appointment was thought to point to a more active military policy.

A marked increase of activity in Russian intelligence work was observed during the period.

No action on the part of the Indian military authorities during the period was called for.

(129) 1906-07.

Little change occurred in the military situation in Russian Central Asia in the year under review; the strength of the Russian garrison was, apparently, much the same as in the previous year and was approximately up to the peace establishment of 57,000 men, exclusive of the Frontier Guard. From a military point of view the event of most importance was the definite opening to traffic of all kinds of the Tashkent, otherwise called the Tashkent-Orenburg Railway, at the end of June, 1906. This line is, however, not yet secure from "wash-outs" caused by the Sir Darya, which on two occasions during the past winter damaged some 20 miles of line between the Perovsk and Turkistan stations.

Throughout the year rumours were current of improvements and extensions to the Central Asian and Merv-Kushk railways. These rumours, however had little foundation until the spring of 1907 when it was ascertained that steps were being taken to double or quadruple the length of the crossing-stations and to improve some of the station-buildings on the second of these two lines. It appeared also not improbable that the necessity for extensive repairs to the Samarkand-Tashkent portion of the Central Asia line was being utilised to provide that section with crossing-stations.

(130) 1907-08.

The military situation in Russian Central Asia underwent little change in the year, and the strength of the troops was approximately maintained

at the peace establishment of 57,000 men. Rumours of actual or contemplated increases of the Turkistan garrisons were somewhat frequent, but neither from Russian Army Orders nor from other official sources was there any confirmation of these reports. It would appear, however, that three small increases took place, *viz.* :—

- (a) in mid-August 400 fully equipped and horsed Cossacks arrived at Krasnovodsk and proceeded to various stations in the district; these Cossacks appeared to be a portion of the 4-squadron Regiment of 1st Astrakhan Cossacks of which only 2-squadrons were previously stationed permanently in Russian Turkistan;
- (b) between February and October 1907, the peace establishment of the Turkistan Pontoon Company appeared to have been increased from 275 to 450 men, *i.e.*, to 2 companies;
- (c) the peace establishment, *viz.*, 227 all ranks, of the Termez Fortress Artillery Company was also apparently raised to some 500—600, an increase which points to the creation of a unit of siege artillery at this station where at the end of 1907 there were said to be 110 siege guns.

Some activity was observed in Russian Darwaz, Shighnan and the Russian Pamirs, in all of which places new roads and forts were built and old ones repaired, and it is said, all posts from Murghabi to Sarai on the Oxus have been strengthened.

The rearmament of the field and mountain batteries, except the reserve batteries, of the 2 Turkistan Army Corps was completed during the year.

The internal condition of Persia, the encroachments on its frontier by Turkish troops, the threatening attitude of Persian Kurds on the Caucasian frontier which culminated in an inroad in the last half of March on Russian territory near Belyasavar, and the continuance of the disorders in the Caucasus, led to measures being taken by the Russian military authorities for the occupation of Persian ports on the Caspian Sea and other places in Northern Persia, as well as to the strengthening of the troops in the Caucasus military district. The reinforcements of the Caucasus during 1907 appear to have amounted to some six Cossack Regiments, 7—8 reserve battalions, and less than a brigade of artillery. Owing to threats of Turkish aggression a division of infantry was said to be under orders from Europe, and a report from Meshed of April stated that 1,550 artillery and infantry were sent from Trans-Caspia to the Caucasus. To meet eventualities in Persia the small garrisons of Lenkoran, Astara and Julfa were raised to 600—2,000 men, the Caspian Sea Flotilla was reinforced by 2 modern torpedo-boats, and a force of some 1,500—3,000 men appeared to have been assembled near Chikishlyar in Trans-Caspia. It seemed that by the end of 1907 the Russians were in a position to despatch at short notice a force of 4 battalions with some Cossacks and mountain artillery to Tabriz, and bodies each of 2,000 men against Resht, Astarabad and Meshed.

Reference is made above to the interruptions of the Tashkent Railway owing to the floods of the Amu-Darya. Measures were taken to prevent a recurrence of the damage; they include the construction of bridges, at a total cost of £50,000, over the places where "wash-outs" were most frequent.

The Central Asian Railway which suffered severely from the rains of the early part of 1907 was visited by the Minister of Communication in June of that year. It would appear that the result of his inspection was far from satisfactory, for since then large quantities of railway material of all sorts were despatched from European Russia, *via* the Caspian Sea, a special yearly examination was instituted of the railway employees to whose inefficiency was ascribed the frequency of serious accidents of late years, and extensive repairs were made to the rolling-stock, especially the engines, of which as many as 50 per cent have been unfit for work at a time.

The conclusion of the recent Anglo-Russian agreement has been utilized by a large section of the Russian press and by individuals in England to revive the proposal for the construction of a line, preferably *via* Herat and Farah, to unite termini of the Russian and Indian railway systems at Kushk and Chaman respectively. A recent address on the subject at Aldershot shows that prominent military opinion at home is unanimously opposed to any such idea.

The disordered state of the country continued and by Imperial order of March 1908 the "State of Extraordinary Protection" in the Ferghana Province and in the neighbourhood of the Central Asian Railway was prolonged to September. It is true that the widespread armed outbreaks of the military as well as the civilian populace which characterized the end of 1905 and the middle of 1906 were not repeated; but in their place the revolutionaries substituted an equally widespread system of assassination and robbery. And this system, measured by the small number of arrests, the large number of victims, the frequency of accidents on the Central Asian Railway in spite of elaborate measures of precaution, and the large sums of money taken from trains, banks and treasuries, appears to have led to more tangible results than the former methods.

Turkistan still maintains notoriety as the "grave of the reputation of many a Russian administrator." In the second quarter of 1907 Lieutenant-General Kartsef was removed from the governorship of Trans-Caspia. But this removal proved at first to be only temporary, and Kartsef returned to his appointment in June of that year, only however, to be definitely removed in December, when he was succeeded by Lieutenant-General M. D. Yevreinov who had 16½ years' service in the Turkistan District and had been Commanding the Caucasian Grenadier Division. At this time rumours were current that General Grodekof was to be succeeded as Governor General by Kuropatkin. It was, however, not until March 1908 that these anticipations were partially realized by the resignation of Grodekof on account of ill-health. In the meantime Kuropatkin once again fell into disfavour owing to the unfounded allegations which he made at the Stoessel court-martial against former ministers. Consequently the appointment of Governor-General was given to Lieutenant-General Byelyavski who at the time was Commander of the Warsaw Fortress and, like his predecessor, had considerable experience of Turkistan.

As early as 1906 it was reported that a transfer of the Turkistan administration from the War Ministry to that of the Interior was soon to take place, and in this connection a special committee was formed at the end of that year to report on the re-organization of the Government of Trans-Caspia. No official action towards any sweeping changes was taken, however, until August of

1907 when the Tsar directed that the War Ministry should assemble an extra-departmental committee to consider the administrative system of Russian Central Asia. This order was published in the beginning of 1908 when, apparently, steps were taken to form the Committee which was to render its report in two years. In the meantime the transfer of the Colony to the Ministry of the Interior is not to take place and Trans-Caspia was to remain under the temporary system of administration which was inaugurated in 1890.

(131) 1908-09.

Little change took place in the military situation in Russian Central Asia during the year. Rumours were current that the peace establishment of all units was to be increased, but no steps appear to have been taken to this end. It is, however, to be expected that some redistribution of the forces in Turkistan and Trans-Caspia will follow on the reorganisation of the Russian Army which, according to official statements made in March 1909, during the Duma debates on the military budget, is being worked out at the present time.

Apart from temporary moves in connection with the situation in Persia, the only important alteration in the strength of garrisons, was the reinforcement of Kushk in August and September by some 1,800 men in consequence of the incursion of the Jamshedis from Afghan territory. At the time that these reinforcements were sent, it was stated that the peace establishment of Kushk fortress, *viz.*, 3,400 of all ranks, was to be permanently increased by 400 Cossacks. Further consequences of the Jamshedi migration have been additions to the fortifications at Kushk and the issue of repeated proclamations and notices forbidding the admittance of Afghans to that fortress and directing the removal of all foreigners from its precincts.

As regards the posts on the Russian Pamirs and along the Panja, rumours were current at the end of 1908 to the effect that, for financial reasons, these posts were to be reduced.

The rearmament of the artillery, has been continued, and now the Cossacks batteries have received the new Q. F., horse artillery guns; some of the new Q. F. field guns appear to have been issued also to the reserve batteries, at least for instructional purposes.

The strengthening of the garrisons of the Caucasus Military District, which began in 1907, was continued throughout 1908; and, in addition to troops, large quantities of munitions of war of all kinds, *e.g.*, 80 6-inch and 8-inch guns, 24 other heavy guns, apparently sufficient Q.F. guns to rearm the field and mountain artillery, over 500 ambulances and medical carts, and telegraph, telephone field railway and pontoon equipment, arrived from European Russia. The additional troops amounted to some 9,000 men, including a division of field and 4 batteries of mountain artillery, 1 to 3 field hospitals, and the equivalent of 6 battalions of infantry. Moreover, when all other 2nd-Category Cossack regiments were demobilised in 1908, 49 Caucasian Cossacks sotnyas, or 7,500 men of this category were retained for service in Trans-Caucasia.

In 1909, owing to the strained relations that had arisen between Russia and Austria over the Bosnia-Herzogovinia question, the 33rd Infantry division and its artillery brigade of 8 batteries returned to Kief from Kutais where they have been stationed since the Russo-Japanese war. Against this loss of some

10,000 of all ranks on a peace footing, have to be set arrivals of 3,150 men from the Warsaw, Vilna and Odessa Districts.

A noteworthy feature on the Central Asian Railway has been the large importation of railway material, such as sleepers, rails and planks, of which 450 truck-loads have been despatched from Krasnovodsk eastwards between September 1908 and March 1909. It would appear that the bulk of this material is being used for the repair of the Central Asian Railway; portions, too, are probably destined for a branch line from Kokand to the new oil-fields at Namangan and for another branch from Rostovtsevo to coal-field at Kshtut. Possibly, too, it may be intended to construct a line from Jebel station, near Krasnovodsk, to Cheleken where rich oil-fields have also been discovered. In this connection rumours began to circulate early in 1909, that Russia had definitely decided to begin the construction of the line that was pegged out in 1904 from Kagan *via* Karshi to Termez. Some confirmation of these rumours is to be found in the reports of pressure being brought to bear on the Amir of Bokhara to subscribe to this project, and of fresh surveys of the line by railway engineers, as also in the attention which is being given to the matter in local publications.

(131-A) 1909-10.

There has been no new railway construction in the area, but considerable activity has been shown in efforts to increase the efficiency of the Central Asian and Tashkent lines, by the construction of additional passing places, the substitution of new for old sleepers, and the overhauling and additions to the rolling stock. The speed of trains has also been accelerated.

A new telegraph line from Samarkand to Termez, following the post-road was commenced in July 1909, but progress on it has been slow, and it is unlikely that the line will be working before the close of 1910.

Generally speaking, military affairs have remained normal throughout the period. With the exception noted below, there have been no important changes in the strength and composition of the Russian Turkistan garrisons.

The Turkistan Railway Brigade, consisting of the 1st and 2nd Trans-Caspian Railway Battalions, was broken up and transferred to European Russia detachments only being retained. This measure represents a decrease of 3,336, peace and war, in the total effective strength of the troops. It is as yet not clear whether this move is a permanent one, or whether it has not rather been carried out from political motives, as a temporary measure, owing to the revolutionary tendencies that have marked the conduct of these railway troops.

The first factory for the manufacture of uniform and equipment for the Turkistan troops was opened at Tashkent. The more important military measures, affecting the Russian army as a whole, include the following:—

- (a) Abolition of the Council of State Defence.
- (b) Increase to the number of members serving on the Military Council from 18 to 24, and the term of service from 4 to 6 years.
- (c) Abolition of the Committee for Training of Troops under the Military Council, and the formation of a Committee under the General Staff for the consideration of the more important questions connected with the preparedness of the army for war.

- (d) Withdrawal of the right enjoyed by the Chief of the General Staff and other high authorities of direct access to the Emperor, in making this privilege the exclusive prerogative of the War Minister.
- (e) Revised Regulations for the Imperial Nicholas Military Academy (Staff College) with a view to its being regarded rather as a higher training school for officers generally than for staff officers only.
- (f) Creation of a Central Gymnastic and Fencing School.
- (g) Abolition of the appointment of Inspector-General of Infantry, and creation of that of Inspector-General of Musketry.
- (h) Offering of additional facilities and inducements for the study of oriental languages.

TURKEY IN ASIA.

(132) 1905-06.

The rebellion in the Yemen, which towards the end of 1905, appeared to be dying out, acquired fresh vigour in 1906. Upwards of 80,000 Turkish troops were employed in the country.

(133) 1906-07.

In Turkey in Asia during the period under review, chief interest attaches to the evacuation of Nejd by the Turks, their failure to restore their authority in the Yemen, and the prolongation of the Hedjaz railway.

Bin Saud, a Wahabi Chief, having consolidated his power in Nejd, inflicted a series of defeats on the Turkish troops occupying that province, with the result that with these defeats have ended, at least for a time, the attempts of the Turks to restore their authority in Nejd. They are said to have agreed with Bin Saud to surrender their guns and rifles for a safe conduct out of the country *via* Kuwait, Medina and Damascus. Apparently the Turks completed their evacuation of Nejd by the end of December 1906, when 1,000 soldiers arrived from Qasim at Basra. These were the sorry remnants of the force of 4,000 men, which had been sent to Nejd four years earlier and had been reinforced from time to time.

Disturbances in different parts of the country in the vilayets of Baghdad and Basra gave further evidence as to the instability of Ottoman Rule in Asia Minor.

The Turkish troops in Yemen, although reinforced in July 1906, suffered a defeat with heavy loss at El Ghula, with the result that it is rumoured that their abandonment of the country all but the Red Sea littoral was decided upon.

The Hedjaz railway, which had reached Mudevere in January 1906, was completed to a point 18½ miles south of Tebuk in September of that year; thus some 93 miles were added in 9 months, as compared with 90 miles in the previous 12 months. Unconfirmed newspaper reports stated that Moaddam, 67 miles further south and 460 miles from both Damascus and Mecca, would be

reached by the 1st January, 1907. With a view to accelerating the completion of the line, construction was begun on the 15th March 1907, from Medina northwards ; the railway material was landed at Yambo, whence it was conveyed by camels to Medina.

A link in the railway system that is to connect Constantinople with Mecca was completed in October 1906, when the Hama-Aleppo section of the Rayak-Aleppo Railway was opened to traffic. This section, however, is somewhat roughly constructed and is not extensively used by travellers.

Owing to financial difficulties little, if any, work appears to have been done on the Bagdad railway apart from the completion of the surveys of two possible routes for the second section across the Taurus. The Home Government has been in correspondence with the French and Russian Governments which are understood not to be averse to the construction of the line.

(134) 1907-08.

During the year under review no progress has been made in the construction of the Bagdad Railway line, and matters stood much as they were at the end of 1906, the line terminating in some fields about Bulgurlu, at the foot of the Taurus range.

Great progress was made on the Hedjaz Railway during the year. On the 1st September 1907 some 200 kilometers had been constructed during the previous twelve months.

Available information tended to show that rail-head had reached a point from 620 to 650 miles south of Damascus by the close of the year. The building of the line has not been unattended with danger, as workmen straying have been killed by the Bedouin, and it has been found necessary to construct block-houses at selected points for the defence of the line.

A station is at present in course of construction at Medina, and the line is being laid from the present rail-head, which is about 100 miles from that place.

In the months of July and September there were reports of disturbances in the neighbourhood of the Euphrates, and fears were expressed as to the safety of navigation on the river. In April, however, the Euphrates and Tigris Steam Navigation Company's steamer, the Blosse Lynch, was attacked by Arabs near Amareh on the Tigris. Three native passengers were killed and others wounded. This attack was said to have been made with the object of attracting the attention of Europeans to the misfortunes and oppressions suffered by the Arabs of the district.

During the latter part of 1907 a little desultory fighting was reported from time to time from the Yemen. The Turkish troops up to the end of the period under review had failed to make any impression on the insurgents, and were generally worsted in the encounters. All the roads in the district were reported to be unsafe, and the Turks could scarcely protect their own convoys.

(135) AFGHANISTAN.

The Amir in 1905-06 was touring in the eastern portions of his dominions in order to consolidate his rule. He decided to import very large quantities of modern arms and to develop largely local manufacture.

In 1907-08, 10,000 M. L. E. short rifles and a million cartridges were imported, while reports were received that Turkish drill instructors were engaged in the improvement of the drill of the Afghan Army.

The wire suspension bridge over the Kabul river below the Darunta gorge was completed and opened by the Amir on the 28th February 1909.

Early in 1909 extensive military preparations were observed in Afghanistan, every efforts being made to improve the army both in drill and organisation. Towards the end of the year these efforts were somewhat relaxed.

(136) PERSIA.

The year 1905-06 witnessed disturbances in almost every quarter of Persia, and notably at Tehran, Meshed, Shiraz, and Seistan. The general feeling of discontent against the present régime appeared to be on the increase throughout the country. Towards the end of December 1905 the situation of affairs appeared so critical that arrangements were made to increase the Legation guards, in case of emergency, at Tehran, Isfahan and Shiraz. No actual movements, however, were carried out.

The question of the military action which Great Britain might have to take in the event of the collapse of the Central Government of Persia was considered.

In Arabistan the position of the D'Arcy Oil Syndicate became such that it was deemed necessary in 1907 to reinforce the guard of His Britannic Majesty's Consul at Ahwaz, and, accordingly, early in December 1907, with the sanction of the Secretary of State, a party of two British officers and 20 men were despatched. The effect produced by the presence of these men has been excellent, and the Company has experienced no further difficulty in its dealings with the tribesmen.

(137) TIBET.

To follow with accuracy recent military events in Tibet more especially as regards numbers and location of Chinese troops, is a matter of some difficulty, owing to the conflicting nature of the information received from various sources.

Up till the latter half of 1909, military affairs were generally normal, but subsequently it became clear that China intended to strengthen her grip of the country. Rumours were rife that a force of 2,000 troops was concentrated on the confines of Eastern Tibet, the whole or a portion of which was to be despatched to Lhasa. China's justification for the move was that the troops were for police duties at the trade marts and on the trade routes, the effective occupation of which by the Chinese would entail the withdrawal of British troops from Tibet, as provided for in Article 12 of the Tibet Trade Regulations, 1903. But the numbers to be employed seemed excessive for the purpose and pointed to an ulterior motive, *viz.*, the military occupation of the country.

In September 1909, it was reported that the Chinese intended to raise 1,000 troops from amongst Chinese subjects in Tibet, and had approached the Nepalese regarding the purchase of 500 rifles.

More than once the Nepalese representative at Lhasa was sounded by the Chinese on the subject of the enlistment of Gurkhas for military service in Tibet.

Further, the Chinese actually asked for permission to despatch 1,000—2,000 troops to Lhasa *via* India, so as to avoid the troublesome and expensive over-land journey.

None of the above proposals were entertained.

The Tibetans, as was to be expected, took alarm at the turn events were undoubtedly taking, and decided to oppose the Chinese advance from the east. Troops were despatched to the eastern frontier for the purpose, but the opposition offered was easily brushed aside, and on the 12th February, 1910, an advanced party, of 40 Chinese mounted infantry entered Lhasa, followed a few days later by the remainder (1,000—1,500) of the invading force. On the arrival of the advanced party of Chinese troops, the Dalai Lama and Tibetan Ministers fled from Lhasa, pursued by Chinese troops. Small skirmishes took place at Chuksam ferry and Kangmar, but the Dalai Lama's flight was not intercepted.

Meanwhile, the absorption of the Tibetan marches in Eastern Tibet had been proceeding, and in March 1910, news was received that Derge, Chaimdo, Draya and Gartok, had been effectively occupied by the Chinese.

At Lhasa, the Chinese soldiers took possession of the Dalai Lama's palace the arsenal, etc., and proceeded to construct barracks to hold 1,000 troops.

Disturbances in Kongbu Province necessitated the despatch from Lhasa of 500 modern-drilled troops. As reported, the subjugation of the Province of Po was to follow and the construction of a direct road by which mounted men could reach Lhasa from Batang in 20 days.

Orders have been given for the despatch of three mountain batteries (6 guns each), Krupp model, manufactured at Kiangnan arsenal, Shanghi, for the use of the Chinese troops in Tibet.

Other indications pointing to the intended complete military occupation of Tibet by China are furnished by the appearance of Chinese troops at Rima in the south-east area, and the reported intention to recruit and quarter troops at Gartok in the extreme west.

As far as can be gathered, the numbers and distribution of Chinese troops in Tibet are, approximately, as follows:—

	No.
<i>Lhasa—</i>	
Mounted infantry	40
Modern-drilled troops	1,000
Old-drilled troops	500
1 mountain battery	?
8 machine guns	?
<i>Lhasa-Gyantse route</i>	220

<i>Ggantse—</i>						
Modern-drilled troops	...	...	...	...	...	150
Old-drilled troops	...	...	...	...	...	60
Shigatse old-drilled troops	...	...	...	...	...	300
<i>Chumbi valley—</i>						
Old-drilled troops	...	...	...	...	...	132
<i>Chethang—</i>						
Old-drilled troops	...	...	...	...	...	60
Ts-öna "	...	...	...	...	...	100
<i>Lhasa Chiamdo route</i>	...	...	...	...	...	700
<i>Kongbu province—</i>						
Modern-drilled troops	...	...	...	...	...	500
<i>Chiamdao</i>	...	...	...	...	...	500
<i>Draya</i>	...	...	...	...	...	100
<i>Derye</i>	...	...	...	...	...	300
<i>Gartok</i> —(Eastern Tibet)	...	...	...	...	..	300
<i>Rima</i> ...	...	...	...	...	...	1,000 (reported but improbable).
<i>Gartok</i> —(Western Tibet)	...	...	...	...	...	500 (not yet confirmed.)

(138) YUN-NAN.

Great military activity has been shown throughout the country during 1909-10.

The number of troops stationed at Yun-nan-fu is nearly 3,000 comprising 5 "Ying" and 1 mountain battery. The nominal strength of the "Ying," or battalion of infantry is 532 of all ranks, and a battery of mountain artillery of 125 men and 6 guns.

Fifteen "Ying" are on the Tonkin-Yun-nan border, including a number of Lolo recruits.

Nine thousand rifles are said to be in stock at the new armoury, and there are 1,000 rounds of ammunition for each rifle in stock.

A new regiment of Kachins is to be raised in the Tengyueh Circle for frontier work, and the re-armament of these troops with Chinese made Mausers is being pushed forward.

In Szu-ch'uan the buildings of the Military School at Chengtu are completed and the small arms factory is ready to begin work. The old arsenal is to be given up to the manufacture of heavy ordnance. The British Consul-General, writing from Chengtu, reports that recruits are being brought in from all over the province, and that the men are well armed, well clothed and well behaved.

A project is now on foot for the reorganisation of the troops of the New Dominion of Chinese Turkistan into some 32 infantry and 27 cavalry regiments which will have a total of 14,600 of all ranks and 3,650 horses. These regiments instead of being localised, are to be liable for general service throughout the Dominion. The latest reports state that the new model troops are to arrive at Kashgar in the autumn of the present year.

The metre-gauge French railway from Laokai to Yun-nan Fu was completed on 1st April 1910.

Considerable military activity has been displayed by the Chinese during the period. The scheme of army re-organization, under which Yun-nan will eventually be garrisoned by two Divisions of modern-trained troops, is slowly but gradually maturing. The total of these regular troops has been brought up to about 8,000, distributed between Yun-nan Fu, Tali Fu and Linan Fu. They are armed with small-bore Mauser rifles and 75 m.m. Krupp mountain guns, but as yet there are no trained gunners for the latter. The enlistment of frontier tribesmen has been taken in hand, and the erection of additional military posts along the Burma frontier is proceeding.

In March 1910 there were reported to be 1,200 Chinese soldiers on the west of the Irrawaddy-Salween watershed, the frontier line claimed by His Majesty's Government. There was also a raid on and the occupation by Chinese soldiers of a village, (Hpinmaw or Pienma), on the British side of the border, and an incursion into Hkamti country, the object apparently being the extension of Chinese administrative control. These latter proceedings called for counter action on the part of the Indian Government, and sanction was given to administrative tours being carried out during the winter 1910-11, into the areas concerned, by civil officer escorted by military police.

CHAPTER IX.

PROGRESS IN MILITARY COMMUNICATIONS.

The measures indicated in this chapter pertain to the Railway, Public Works, and Commerce and Industry Departments, who will no doubt deal with them fully in their summaries. They are here briefly referred to as conveniently showing the more important ways in which military communications have been improved.

(139) THE KHYBER.

During 1905-06 the earth work in connection with the doubling of the Khyber road was completed, but some of the metalling remained to be done. Work was continued during the following year, when the doubling of the Khyber road was nearly completed, with the exception of some rock cutting near Fort Maude. In 1907-08 the work was fully completed.

The construction of the railway through the hills north of the Khyber was in progress during 1905-06, and construction trains were running on a portion of the line. Work was continued during 1906-07, and 1907-08, but was stopped during 1908-09 until funds became available.

(140) KHUSHALGARH RAILWAY BRIDGE.

The construction of the railway bridge over the Indus at Khushalgarh was under construction when Lord Minto assumed office. The work approached completion during 1906-07, in which year the broad gauge line on the further bank was laid for a few miles. Both the bridge, and the broad gauge railway to Kohat were finally opened for traffic in January 1908, thereby greatly improving our strategical position with regard to Tirah, and in a lesser degree, with regard to Waziristan.

(141) CONVERSION OF THE KOHAT-THAL RAILWAY TO BROAD GAUGE.

The conversion to broad gauge of the Kohat Thal Railway has not yet been carried beyond Kohat and is awaiting further orders from the Secretary of State. Pending the resumption of the broad gauge conversion from Kohat to Thal, and its eventual extension up the Kurram, instructions have been issued to the North-Western Railway to improve the carrying power of the present line by the provision of heavier rails and improved type of rolling stock as opportunity offers.

(142) OTHER COMMUNICATIONS ON THE NORTH WEST FRONTIER.

The bridge over the Gumal river at Murtaza on the Tank-Wana road was completed in 1906-07; in which year work on the Upper Swat Canal was begun.

In 1908 the Railway Department brought to notice the great improvements recently made in the carrying capacity of the 2' 6" gauge railway, and made suggestions for a Trans-Indus system of this nature. Except in so far as such a line might replace the more costly broad gauge Loi-Shilman project, the proposals were of commercial rather than strategical value. As regards the

Loi-Shilman, work on which was stopped in April 1908 owing to the disturbances on the frontier, investigations go to show that an improved narrow gauge line might in a large measure meet probable military requirements without transgressing the bounds of present day finance.

(143) NORTH-EASTERN AND EASTERN FRONTIER.

During 1905-06 the following measures were taken to open out or improve communications on the North-Eastern and Eastern frontier :—

- (a) The Railway Board sanctioned the construction of a railway from Thamaing on the Prome Section to Malagaon on the Mandalay Section of the Burma Railways.
- (b) A survey for a railway to connect Teng yueh in Yun-nan with Bhamo in North Burma was undertaken in December, 1905, and completed in April 1906.
- (c) In October the Government of Assam and Eastern Bengal notified that the survey of a line to connect Lengar Bazaar and Netrokoma would be undertaken.
- (d) In February 1906, a section of the Gauhati Extension of the Eastern Bengal State Railway was opened to traffic.
- (e) During the same month, the Railway Board sanctioned the survey of a line from Nyaungyan to Sanghai, a distance of about 112 miles.
- (f) The same authority sanctioned the survey for a line from Moulmein to Yé.
- (g) During the same month the Pegu-Moulmein Railway was reported to be approaching completion.

(144) BAGHDAD RAILWAY.

The question of the Baghdad Railway and British participation therein was exhaustively discussed by the Indian Military authorities.

(145) BROAD GAUGE CONNECTION BETWEEN BOMBAY AND SIND.

The military desirability of a broad gauge railway connecting the Bombay, Baroda Railway with the North-Western Railway at Hyderabad (Sind) was in 1908-09 set out in a despatch to the Secretary of State for India. Investigation of its value goes to show that the military gain to be expected therefrom is a saving of at least 38 days in moving our forces from Southern and Central India to the frontier—an acceleration which would be priceless in determining the course of a campaign. In its internal aspect, the alternative route thus afforded to the Punjab might also conceivably render incalculable service. In view however of the Anglo-Russian Convention, the Secretary of State for India did not regard such a connection as a strategical necessity.

(146) WIRELESS TELEGRAPHY.

In addition to the existing station at Calcutta, wireless stations were sanctioned for Aden, Bombay, Cape Comorin, and Madras; points selected in consultation with His Excellency the Naval Commander-in-Chief.

The Admiralty suggested that the range of wireless telegraphy installations should be at least 500 miles, and pointed out that India might eventually form a link in a chain of High Power Stations.

The proposals already sanctioned have accordingly been reviewed in the light of the remarks of the Admiralty and strategical principles have received due consideration in the discussion of this project.

The Secretary of State has approved generally, for strategical and other reasons, the establishment, as funds became available, of a system of inland and coastal wireless telegraph stations, the first eight stations to be equipped are Calcutta, Allahabad, Delhi, Simla, Bombay, Nagpur, Karachi and Lahore.

Wireless installations have already been established at Aden and Berbera.

(147) **LOR SHILMAN RAILWAY.**

Work was stopped by the order of the Secretary of State early in 1909 when plate laying had reached as far as mile 296, and has not been recommenced.

(148) **KURRAM ROAD.**

The road is metalled to 2 miles beyond Thall, proposals have been made to the Secretary of State to continue the metalling towards Parachinar.

CHAPTER X.

ORDNANCE DEPARTMENT.

(149) REDISTRIBUTION OF THE STAFF OF ARSENALS AND DÉPÔTS.

It was found necessary to redistribute the staff of arsenals and dépôts consequent on—

- (a) the scheme for the redistribution of the army in India ;
- (b) the necessity for keeping the ordnance circles of supply within the limits of army commands ; and
- (c) the increase in the number of ordnance and engineer field parks and of reserve generally, including the increase in the scale of ordnance field park stores.

The redistribution provided for the gradual abolition of the arsenals at Bombay and Mhow and the ordnance dépôts at Poona, Ahmedabad and Trinulgherry, and the formation of an arsenal at Kirkee with a dépôt at Bombay, as well as a reduction in the establishment of officers, warrant officers, clerks and lascars. The estimated eventual saving is Rs. 83,000 per annum.

(150) ENCOURAGEMENT OF THE STUDY OF NATIVE LANGUAGES BY EUROPEAN CIVILIAN EMPLOYÉS OF THE ORDNANCE DEPARTMENT IN INDIA.

In order to encourage European civilian employés of the Ordnance Department in India to acquire a knowledge of the language spoken by the native establishment of the factories or arsenals in which they are employed, the Government of India, with the approval of the Secretary of State, have sanctioned the grant of a reward of Rs. 100 to each civilian employé, recruited in England, who within five years from the date of arrival in India, passes a colloquial test in the language spoken by the native staff of the arsenal or factory in which he is employed.

(151) FORMATION OF A CORPS OF ARTIFICERS.

With the approval of the Secretary of State, sanction was in 1905-06 accorded to the formation of a corps of native artificers for service with batteries of Royal Artillery and ordnance field parks. The corps was to be designated "The corps of Indian Ordnance Artificers." The establishment proposed was to consist of 716 men (including a reserve 150) ranking as havildars (1st class artificers), naicks (2nd class artificers) and sepoys (3rd class artificers). No man would ordinarily be enrolled in the corps as a 3rd class artificer unless he had served a three years' apprenticeship at Jubbulpore. Eligibility for promotion to depend on the possession of certain specified qualifications. The Superintendent of the Gun Carriage Factory to be the Officer Commanding the Corps. The formation of this corps however proved to be unsuccessful, owing mainly to the pay and conditions of service not being sufficiently attractive to induce the right class of men to enlist therein ; and the Director-General of Ordnance accordingly submitted a revised scheme for the training of domiciled Europeans and Eurasians as artificers for service with batteries and in factories and arsenals ; but this scheme too has had to be dropped.

(152) CHARGE ALLOWANCES FOR WARRANT OFFICERS IN ARSENALS.

Proposals regarding the grant of charge allowances to Warrant Officers performing certain definite duties in arsenals, have been accepted by Government, and have been referred to the Secretary of State for sanction.

(153) POSITION OF ORDNANCE LASCARS.

The question of improving the position of Ordnance Lascars has been submitted to Government.

(154) ABOLITION OF CIVIL CHIEF MASTER ARMOURERS.

A proposal to abolish the establishment of Civil Chief Master Armourers and to replace them by a new class of Armourer Viewers selected from the present staff of Armourer Sergeants, etc., has been submitted to Government.

(155) EXTENSION OF ORDNANCE FACTORIES IN INDIA.

To give effect to the scheme for the increase in the reserves of artillery ammunition and in the manufacturing capacity of Ordnance factories in India, it was found necessary to acquire land and construct new buildings, costing approximately Rs. 27,02,432, for the factories at Ishapore, Cossipore, Dum Dum Kirkee and Aruvankad.

(156) EXTENSION OF ARSENALS.

The scheme for the increase in the reserves of Artillery ammunition, etc., and in the number and scale of ordnance and engineer field parks, and for the redistribution of the establishments of arsenals and depôts consequent on the redistribution of the army in India, necessitated the provision of additional storage accommodation and of quarters for subordinates in arsenals, costing Rs. 8,27,000 approximately.

(157) GUN CARRIAGE FACTORY, BOMBAY.

This factory was finally closed on the 22nd January 1907.

(158) ORDNANCE FACTORIES.

The Madras Gun Carriage Factory was closed on the 1st April 1909, and the closing of the Harness and Saddlery workshops at Perambur, Madras has been ordered.

(159) MANUFACTURE OF ACETONE IN INDIA.

In 1906-07 a proposal was submitted to undertake the manufacture of Acetone (used in the preparation of cordite) at the Aruvankad factory, and steps were taken to obtain an estimate of the probable cost of the necessary plant and appliances. The proposal was subjected to prolonged consideration, with special reference to the local production of acetate of lime; and finally in September 1909, the Government of India decided to drop it. But the Secretary of State for India has now asked that this decision should be reconsidered.

(160) RECOVERY OF ACETONE.

A proposal for the installation of a plant at the Cordite Factory for the recovery of Acetone used in the manufacture of cordite was in 1908-09 accepted

by the Secretary of State, but owing to lack of funds the measure could not be carried out in that year. The latest estimated cost of the scheme is Rs 37,430 initial and Rs. 25,150 recurring; but as it will reduce the cost of manufacturing cordite by about Rs. 42,435 a year, the scheme involves a saving. The necessary funds were provided in 1903-10 and in 1910-11, and the measure has now been introduced.

(161) STORAGE AND EXAMINATION OF CORDITE.

In connection with the explosions of cordite which occurred at Hyderabad (Sind) and Ferozepore, and acting on the suggestions made by Lieutenant-Colonel Sir F. L. Nathan, R.E., Superintendent of the Royal Gunpowder Factory, Waltham Abbey, who was deputed to this country to enquire into the cause of the explosions, the Director-General of Ordnance in 1906-07 recommended the appointment of an inspecting officer for cordite with a subordinate staff, and the provision of a suitable chemical laboratory for his use, with a view to the better control of the question of cordite storage in India. In anticipation of the formulation of complete proposals on the subject, the Secretary of State was asked to sanction the appointment of two chemical experts. In the following year it was decided to establish a Central Chemical Laboratory at Naini Tal for the better control of questions of cordite storage in India. The laboratory was to be in charge of a Chief Chemical Examiner on a salary of Rs. 750 rising to Rs. 1,000 per mensem, assisted by a subordinate staff; and the Secretary of State was asked to send out the necessary apparatus and appliances for the laboratory at an estimated cost of £560. The Central Chemical laboratory was established in a temporary building at Naini Tal in 1903-09 when the Chief Chemical Examiner took up his duties; but final proposals for the accommodation for the Laboratory and its staff are still under consideration.

(162) STORAGE OF SMALL ARM AMMUNITION.

It having been brought to notice in 1907-08 that experience of the deterioration of cordite had rendered further precautions necessary in regard to the storage under the best possible condition as regards temperature and regular turn-over of small arm ammunition, the Commander-in-Chief recommended, and the Government of India approved of, the service ammunition of *all* units, British and Indian, being kept in Ordnance charge instead of a certain scale in regimental charge as heretofore. The fixed allotment of practice ball ammunition maintained by units and others was greatly reduced, and an increased scale was allowed for units not quartered at a station at which there is an arsenal.

(163) MANUFACTURE OF GUNS IN INDIA.

Seventy Q. F. 18-pr. guns have been made up in the Gun and Shell Factory, Cossipore. One gun with carriage, both being of Indian manufacture, was sent home for proof and examination. The range and accuracy trials and inspection proved very satisfactory, the accuracy of the shooting of the gun both on a carriage manufactured in the Royal Carriage Department and its own Indian carriage, being reported to be as good as that of a home manufactured gun.

(161) ELECTRIFICATION AND EXTENSION OF THE HARNESS AND SADDLERY FACTORY, CAWNPORE.

A scheme for substituting electricity at the Harness and Saddlery Factory, Cawnpore, for steam power, and for extending the factory, was accepted by the Government of India in 1906-07. The cost of the proposals was estimated at Rs. 3,03,904 initial, and Rs. 19,056 annual recurring. The cost of the electric installation was to be spread over a period of three years and provision to meet the expenditure on this account during the first year was made in the estimates of 1907-08. Budget provision was repeated, and work continued in 1908-09, and in 1909-10, in which year the work was completed.

(165) ELECTRIFICATION OF THE AMMUNITION FACTORY, DUM DUM.

Proposals were put forward in 1906-07 for working the Ammunition Factory, Dum Dum, by Electricity in place of steam power. The cost of the scheme was estimated at Rs. 3,53,020 initial, and Rs. 31,900 annual recurring. The scheme was accepted in principle, and referred to the Secretary of State who has sanctioned it; but owing to the financial stringency it has not yet been found possible to provide the necessary funds to carry out the measure.

(166) COMPLETION OF THE ELECTRIFICATION OF THE GUN AND SHELL FACTORY, COSSIPORE.

The Gun and shell Factory, Cossipore, already has electrical power to run the new machinery which was added to meet the increased manufacturing power required under the reorganisation scheme for increasing the reserves of artillery ammunition. The older portion of the Factory is however still run by steam power, but as the plant is nearly worn out, it has been decided to extend electrical power throughout the Factory, at a cost of Rs. 1,04,826; the work to be completed in two years. It is anticipated that an annual saving of Rs 10,619 will result.

(167) OFFICE OF THE INSPECTOR-GENERAL OF ORDNANCE FACTORIES IN INDIA.

The clerical and menial establishment authorised for the office of the Inspector-General of Ordnance Factories on its formation in January 1906, having been found inadequate to cope with the work required to be performed, a revised staff was sanctioned for the office at an increased expenditure of Rs. 21,696 per annum.

(168) TRIAL OF MOUNTAIN ARTILLERY HOWITZERS.

A sum of £10,000 was provided in the Home Estimates of 1907-08 towards the cost of the trial in England of the new types of guns and howitzers for Mountain Artillery.

(169) DISPLACEMENT PROCESS FOR THE MANUFACTURE OF GUNCOTTON.

A system for the manufacture of guncotton by the "Displacement" process instead of by the "Abel" process has been introduced with the approval of the Secretary of State.

(170) STORAGE OF CORDITE.

On account of the numerous spontaneous ignitions of cordite which have occurred in India, which may have been due to the unsuitable conditions of Magazines in which cordite is stored, a Committee was assembled in December 1909 to consider what steps should be taken to improve the Magazine Accommodation of the various Arsenals and Defences of India.

The Committee recommended :—

I. Cells to type plan D. B. No. 72 of 1909 modified to provide for insulation, ventilation and refrigeration.

II. Cordite cells in the following arsenals to be refrigerated :—

Kirkee, Allahabad, Ferozepore, Fort William, Karachi, Madras and Rangoon. The immediate provision of refrigerating plant for the cells at Allahabad for trial, others to await the result of this trial.

III. Cordite cells in the following Coast Defences to be refrigerated :—

Aden (Forts Tarshayne and Morbut), Bombay (Elephanta, Oyster Rock, Middle Ground, Colaba North and South, Malabar and Mahaluxmi), Karachi (Manora), Hughli Defences (Chingri Khal), and Rangoon (King's Bank).

IV. That refrigerating plant be provided in the first instance for trial at :—

(a) Fort Tarshayne (utilizing power from the Defence light plant if found to be possible).

(b) Elephanta (special engine power being provided).

(c) Colaba North (utilizing power from the Town Electricity supply).

The Committee lay particular stress on the urgent necessity for the immediate provision of storage cells required at Arsenal stations and also for the refrigeration of these cells and of the Coast Defence Magazines for which recommended.

In January 1909 a proposed distribution for storage purposes of Q. F. Ammunition was put forward based on "Main Storage" and "Supply" centres. The former were placed in Arsenal stations in which the best conditions of cordite storage were obtained and the bulk of the ammunition was placed in these. The latter were the hotter places of storage and only 80 rounds per gun next for issue were stored there.

Assuming that the Government of India accept the Committee's proposals a fresh distribution of cordite charges is suggested based on the following principle, *viz.*—To store in each arsenal—

(a) The Ordnance Field Park Reserve dependent on the Arsenal.

(b) The Ammunition maintained in Ordnance charge for ammunition columns dependent on the Arsenal.

(c) The Ammunition for Reserve Batteries maintained in the Arsenals.

- (d) The Ordnance Reserves for Batteries attached to Army Troops dependent on the Arsenals.
- (e) Ordnance Reserves for Internal Defence Batteries dependent.
- (f) Practice and working balance of ammunition for Batteries dependent on the Arsenal.

These proposals, to which great importance is attached, have been accepted in principle and estimates are in preparation.

(171) REARMAMENT OF HORSE AND FIELD ARTILLERY.

The reconstruction of the Artillery vehicles received from England referred to in chapter IV will, it is anticipated, be completed during the financial year 1910-11. 53 Batteries of Horse and Field Artillery and 10 Ammunition Columns are in possession of the Mark II I. P. strengthened equipment, and the remaining Ammunition Columns will be completed this year.

(172) INCREASE IN THE RESERVES OF RIFLES.

Owing to delay in the supply of materials consequent on change in the pattern of backsight for the Mark III short rifle, only 4,980 complete rifles were manufactured during 1909-10. It is anticipated that 10,000 complete rifles will be manufactured during 1910-11. See also chapter IV.

(173) GUNS IN INLAND DEFENCES.

The withdrawal of all S. B. and R. B. L. guns from Inland Defences and replacement by guns of greater efficiency and more modern character, referred to in chapter IV is still in progress.

(174) SUPPLY OF ORDNANCE EQUIPMENT TO UNITS.

The question regarding a revised procedure for the supply of Ordnance equipment to units is under consideration with special reference to the reorganisation of the Ordnance Department in India.

(175) SHORT AND CHARGER LOADING RIFLES FOR INDIA.

In order to bring up to date Indian requirements in the matter of modern rifles, steps are being taken to purchase from Home and to manufacture in India the following numbers of short rifles and to convert M. L. E. rifles in the hands of the troops into Charger Loading to the following extent.

SHORT RIFLES.

By purchase from Home	...	...	...	...	64,000
By manufacture in India	...	...	...	...	45,000

CHARGER LOADING RIFLES.

By conversion in India	68,000
------------------------	-----	-----	-----	-----	--------

This measure is being spread out till the year 1912-13, when the shortage in modern rifles will be as follows :—

Short Rifles	...	...	...	...	...	6,689
Converted Rifles	...	...	...	...	...	21,379

This shortage will be made good in the year 1913-14.

CHAPTER XI.

MEDICAL AND SANITARY.

(176) 1905-06.

A Royal Army Medical Corps officer was appointed for special duty in connection with the treatment of Venereal Disease.

The X ray institute at Dehra Dun commenced work, and courses of instruction of officers and medical subordinates are now being carried on regularly.

With a view to removing administrative inconvenience the Indian Medical Service on the *military* side was delocalised with the approval of the Secretary of State for India. Officers of the Indian Medical Service will henceforth be liable for *military* employment in any part of India instead of in the limited area to which they happened to be posted under the hitherto existing system of territorial allotment. For purposes of promotion to the selected ranks and transfer to civil employ officers now in the service will continue to be borne on their respective lists until they are absorbed. Officers appointed to the service in future will, however, be allowed a choice of the following *civil* areas for the purpose of subsequent transfer to *civil* employment:—

- (1) Madras and Burma.
- (2) Bombay with Aden.
- (3) Upper Provinces, *i.e.*, United Provinces, Punjab and Central Provinces.
- (4) Lower Provinces, *i.e.*, Bengal, Eastern Bengal and Assam.

Such choice will be subject to the requirements of the service, and will be regulated by the position of the candidates on the list as determined by the combined results of the preliminary and final examinations.

(177) 1906-07.

It was decided that the Army Bearer Corps need only be maintained at the strength required to carry out peace duties, and as 450 wheeled stretcher carriages have been constructed and are being issued to replace dandies wherever feasible, orders were consequently issued for the reduction of the corps from 6,000, the strength originally fixed, to 1,500.

As much administrative inconvenience was experienced under the existing system, it was decided to unify the Indian Medical Service by the abolition of separate establishments for military commands.

Special operating rooms were provided at certain stations for British and Indian troops to bring our medical arrangements up to date.

In order to provide for more efficient supervision over sanitary matters, which have such an important influence on the health of troops, courses of instruction for officers, non-commissioned officers and men were initiated. These consist of not less than four lectures delivered annually by medical officers selected by General Officers Commanding Divisions and Brigades, at all stations where British troops are quartered.

Additional apparatus was provided for the 22 clinical laboratories at Divisional and Brigade head-quarters, and 72 microscopes for use in hospitals of British and Indian troops.

A standing committee, composed of officers of the Royal Army Medical Corps and Indian Medical Service, was appointed by the Government of India to investigate and advise on the incidence and prevention of enteric fever. Meetings were held from the 31st July to 3rd August, and on the 17th and 18th October 1906, various recommendations were made some of which have been carried out.

(178) 1907-08.

Revised rules governing the pay and appointment of specialists in military medical science were issued.

Changes were made in the Indian rates of pay and allowances of Royal Army Medical Corps officers to accord with the Royal Warrant of 10th January 1907.

A Royal Army Medical Corps officer was appointed for a period of one year, with effect from 24th July 1907 as Inspector and lecturer on health efficiency of troops.

Alterations were made in the Regulations for Queen Alexandra's Military Nursing Service for India, reducing the age limit for those joining the service and introducing age limits for retirements. Further, admission to the service is now restricted to ladies trained in *British General Hospitals* only.

A committee on the improvement of Station Family Hospitals was held and their recommendations are under consideration.

A committee was held to consider various proposals in connection with the trooping arrangements for invalids and their recommendations are under consideration.

The "wet" system of Conservancy is being tried in the lines of British troops, at 12 selected stations.

The appointment of Divisional Sanitary Officers was approved as a tentative measure.

The appointment of Sanitary Officers for field service was approved and a reference on the subject has been made to the Secretary of State for India.

A proposal to establish 13 additional brigade laboratories was approved.

(179) 1908-09.

Sanction has been given for a sanitary officer to be attached to the headquarters of each division and line of communications on active service.

With a view to isolating enteric fever convalescents, a dépôt, similar to that opened last year at Naini Tal, has been established at Wellington.

The British troops quartered in certain particularly malarious places have been provided with mosquito curtains.

The purification of water on the march, at camps and on service, by chemical means has been further tried and arrangements have now been made for a considerable supply of tablets of sodium bi-sulphate for this purpose.

Twelve additional brigade laboratories have been established. There are now 10 divisional and 28 brigade laboratories, every station that is the headquarters of a division or brigade being provided with a laboratory.

Flyproof wire gauze doors and windows are being provided for dining rooms and kitchens of officers and other quarters, and for barrack dining rooms in Baluchistan where flies are particularly numerous. They were previously authorised for hospital wards and for hospital and barrack kitchens everywhere.

The wet system of conservancy, which consists in the use of a solution of saponified cresol, has been adopted for the disinfection of the latrines of all British barracks and hospitals, in place of the dry-earth system previously in use.

1909-10.

VENEREAL AND HEALTH STATISTICS.

The report and statistics of venereal disease among British troops for the

* 1901	...	...	...	276·0
1902	...	...	...	281·4
1903	...	...	...	249·6
1904	...	...	...	200·3
1905	...	...	...	154·3
1906	...	...	...	117·3
1907	...	...	...	89·9
1908	...	...	...	69·6

year of 1909 shows that the admission rate per 1,000 for all India was 67·8. This ratio compares favourably with the statistics for the past 8* years; and the steady decrease which has taken place is attributed to the personal influence of Commanding Officers, to the spread of temperance, to the introduction of games and amusements, to the more thorough treatment of the disease by which relapses are checked, and to the deterrent effect which loss of service pay has on those who contract it. It has been observed that the ratio is persistently higher in some stations than at others. As regards enteric fever, there has been a satisfactory fall in both the admission and death rates, as will be seen from the following figures:—

Year.	RATIO PER 1,000		Mortality per cent.
	Admissions.	Deaths.	
1905	15·5
1906	16·7
1907	17·8
1908	17·0
1909	14·3

As in previous years enteric fever was more prevalent during 1910 among troops in the Northern than in the Southern Army; and its incidence was greatest in Meerut, Lahore Cantonment, Kirkee, Lucknow, Sialkot, Multan and Dinafore.

The following table shows the general health of the troops since 1903 :—

All causes.	RATIO PER 1,000 OF STRENGTH.		
	1903-07.	1908.	1909.
Admissions	878·6	886·2	716·9
Constantly sick	51·12	45·81	40·26
Deaths	10·47	9·09	6·25
Invalided period home	28·01	16·67	9·06
Average period of sickness to each soldier	19·76	16·77	14·69
Average duration of each cause of sickness	22·49	20·05	20·49

The satisfactory reduction under all heads is attributable to the following causes ; (1) steady improvement of Cantonment Sanitation, (2) greater interest shown by Commanding and other officers in the sanitation of barracks, and lines, (3) an increased appreciation by soldiers of a rational mode of life, (4) extended knowledge of elementary hygiene, (5) provision of steam disinfectors in various large garrisons, (6) anti-enteric inoculation.

(180) REORGANISATION OF THE MEDICAL STORE DEPARTMENT.

At the instance of the Director General, Indian Medical Service, the question of the reorganisation of the Medical Store Department was taken up in February 1910. There are at present five such dépôts, and the main suggestions put forward by him are (1) the abolition of the Rangoon Dépôt, (2) the concentration of manufacture at the Madras and Bombay Dépôts, and (3) the Calcutta and Lahore Dépôts to be reduced to the status of supply and storage Dépôts only, and not to undertake manufacture. The Director General, Indian Medical Service also suggested the transfer of the Lahore Dépôt to Karachi. The proposals, from which considerable savings are anticipated, are still under consideration.

It has independently been decided that an annual administration report for the Department shall be instituted in order to ascertain whether it is being worked efficiently and economically.

(181) RECRUITMENT ESTIMATES FOR THE INDIAN MEDICAL SERVICE.

So far back as 1901 Lord George Hamilton, then Secretary of State for India, pointed out that the system on which the number of appointments to be competed for at the half yearly examinations for admission to the Indian Medical Service was based, was open to objection, inasmuch as the numbers fluctuated so considerably. After prolonged discussion extending over 8 years, during which the system obtaining for recruiting the Indian Civil Service was considered, proposals were placed before the Secretary of State in September 1909, suggesting various modifications in the system of arriving at the number of appointments to be competed for at the half yearly examinations for the Indian Medical Service, which would prevent that number being subject to violent fluctuations. The Secretary of State has sanctioned these proposals as an experiment for 5 years.

STATION HOSPITALS FOR INDIAN TROOPS.

Proposals are under consideration for the introduction of station hospitals for Indian troops, in place of the present system of treating sick Indian soldiers under regimental arrangements. The change has been advocated in the interests of efficiency and economy, and in order that officers of the Indian Medical Service may obtain wider administrative experience. In June 1910 the Government of India referred the whole question to a Committee of Royal Army Medical Corps and Indian Medical Service Officers, presided over by Surgeon General Lukis, whose report is receiving attention.

(182) MEASURES SANCTIONED PERMANENTLY.

Sanction accorded to the introduction of a new stretcher pillow invented by Sub-Conductor R. Kenny, Madras Miscellaneous List.

Sanction accorded to the scheme for systematising routine in dealing with Venereal Disease.

Sanction accorded to the provision of rooms for storing laundry clothes in the Lines of British Troops, and to the gradual introduction of the same as funds become available.

Grants-in-aid sanctioned in a few cases to enable regiments to obtain mosquito curtains for use by British soldiers in Barracks.

Sanction accorded to a limited extent to the provision of mosquito nets for use by patients in hospitals for Indian Troops.

(183) MEASURES SANCTIONED TENTATIVELY.

Sanction accorded tentatively to the scheme for employing civilian dentists for the Army in India.

Sanction accorded tentatively to the scheme for introducing more uniformity in the dieting of Convalescent British soldiers, and for improving the conditions under which their meals are served up.

Sanction accorded, as an experimental measure for six months, to the scheme for improving the cooking in Station Hospitals of British Troops.

(184) MEASURES AT PRESENT UNDER CONSIDERATION.

Proposals for the improvement of the equipment for officers' wards.

Proposals for improving the pensions of members of Queen Alexandra's Military Nursing Service for India.

Scheme for provision of accommodation for Military insane in the Central Lunatic Asylum at Yeravda.

Scheme for improving the pay and prospects of matrons and employment of ayahs in Station Family Hospitals.

Revision of charge allowance allowed to Senior Medical Officers of Station Hospitals.

Provision of white drill suits for all British Nursing orderlies.

Provision of an operating theatre at Dagshai.

CHAPTER XII.

MILITARY WORKS.

(186) MILITARY WORKS EXPENDITURE.

The following statement shows the expenditure for Military Works and Special Defences during the past five years.

Year.	47—MILITARY WORKS.		47 A—SPECIAL DEFENCES		REMARKS.
	Budget Provision.	Actual Expenditure.	Budget Provision.	Actual Expenditure	
	Rs.	Rs.	Rs.	Rs.	
1905-06	... 1,72,36,000	1,64,23,559	37,98,000	21,94,586	
1906-07	... 1,75,41,169	1,69,12,731	34,73,000	20,75,563	
1907-08	... 1,88,86,699	1,75,04,134	19,18,030	17,44,811	
1908-09	... 1,79,87,800	1,45,10,419	16,42,000	4,35,672	
1909-10	... 1,28,83,900	*1,28,07,000	4,19,400	*5,51,000	* These are revised estimate figures. Actuals are not yet available.

(187) RECONSTRUCTION OF THE BREAKWATER PIER IN THE ROYAL INDIAN MARINE DOCKYARD AT BOMBAY.

A portion of the Breakwater outside the Royal Indian Marine Dockyard at Bombay collapsed in the year 1896. This partial subsidence did not affect the protection afforded to vessels from sea and weather, but it gave rise to serious inconvenience, as a holdfast at the end of the pier had also subsided. From that date various schemes were from time to time put forward to repair the damage. A modest scheme of repairs to cost $1\frac{1}{2}$ lakhs was at first put forward, but as the result of five years consideration of modern requirements these smaller schemes were set aside; and finally in October 1901, as the then existing pier was inadequate for those requirements, including trooping requirements, proposals were placed before the Secretary of State based on designs and estimates drawn up by Mr. E. Jackson, M. I. C. E., the Port Engineer of Karachi, for replacing the then existing breakwater pier by a new pier. This was designed to afford additional protection for the entrance to the wet basin, so as to allow of vessels being moved with safety in any weather to and from the basin and dry-docks, and to provide a safe anchorage for the small dockyard craft. Eventually also the pier could be extended so as to enclose a basin, and allow of troops and stores being brought alongside transports in trains. The new pier was to be constructed at a different angle to the shore to

the old one, was to be 760 feet long, with a width varying from 50 to 180 feet ; and the whole scheme was estimated to cost about twenty lakhs. The Secretary of State sanctioned the scheme in 1902, but in according sanction suggested on the advice of the Director of Works at the Admiralty, that the pier should be of an uniform width of not less than 90 feet, and preferably 150 feet, with a view to provision of loading and storage facilities. These suggestions were considered by a conference held in Bombay in January 1903, and presided over by His Excellency Admiral Sir Charles Drury, the then Naval Commander-in-Chief ; and on the advice of this Conference the Government of India in July 1903 submitted a modified scheme to the Secretary of State, providing for a pier of 150 feet width throughout, so as to permit of the construction of sheds for victualling and fitting out ships, and other transport and loading facilities. This modified scheme, which was sanctioned by the Secretary of State in October 1903, was estimated at 24 lakhs. In September 1904 the Government of India informed the Secretary of State that they had accepted a tender for the work from Messrs. Lowther and Company of London. The work was started by them in the early part of 1905, and by the middle of November 1906 the seaward wall of the pier had been completed. At this time it was represented by the local authorities that the projection of the new pier into the tideway had led to an increase in the deposit of silt. This silting action had also been increased by the further resistance to tide offered by certain extensive dock works being carried out by the Port Commissioners. To reduce silting, the designs and whole scheme generally had to be reconsidered ; and in order not to greatly exceed the estimate of 24 lakhs, it was in 1906-07 decided to continue the outer wall of the pier to a total length of 1,499 feet, and to reduce its width to 30 feet. This, together with the work undertaken by the Port Commissioners, would enclose a basin with an opening of 500 feet wide. These revised designs were estimated to cost Rs. 30,91,000 but did not admit of unloading facilities, victualling sheds, etc., as at first intended, though providing for the berthing of vessels. The work as thus redesigned was finally completed in 1908-09.

(188) KIRKEE ARSENAL BUILDINGS.

In connection with the scheme for the abolition of the Bombay Arsenal, and the creation of a 1st class arsenal at Kirkee, the Government of India in May 1903 asked the sanction of the Secretary of State to estimates amounting to Rs. 14,39,500 for the necessary buildings at the latter place. In anticipation of his sanction, which was not received till November 1904 preliminary operations were begun in June of that year. The estimates were shortly after increased to Rs. 15,81,000 to admit of certain necessary additional works. The work has been in progress ever since, and it is hoped will be completed in 1910-11.

(189) EXTENSION OF ORDNANCE FACTORIES AND ARSENALS.

In the memorandum on the preparation of the Army in India for war, Lord Kitchener made certain proposals for additions to the existing reserves of artillery ammunition, and for an increase to the manufacturing capacity for such ammunition in our ordnance factories. These proposals involved, among other things, very extensive building requirements, etc., at the various factories and arsenals throughout India.

As regards the factories the necessary buildings, land, etc., were originally estimated to cost a total sum of Rs. 27,02,000 ; and work thereon was started in 1905-06, in which year a sum of Rs. 13,27,700 was provided for the acquisition of land at Cossipore and Ishapore, and for the construction of the necessary buildings at those places, as also at Kirkee, Dum Dum and Wellington. Work at the various Factories has been steadily in progress since that year, and has now, 1909-10, been practically completed. Owing to the increase in the reserves of ammunition extensive increases also became necessitated in the storage accommodation in the arsenals throughout India, and in quarters thereat for Ordnance personnel. These works were estimated to cost a total sum of Rs. 8,53,000, and work thereon was started in 1905-06, since when it has steadily continued. At the present time (1910) the progress made in the scheme as a whole is as follows. Extra storage has been practically completed at Quetta and Rawal Pindi, is making good progress at Kirkee and Allahabad, and remains to be provided at Ferozepore. Additional quarters for European subordinates have been completed at Ferozepore and Karachi, good progress has been made at Kirkee and Allahabad, and remains to be provided at Rawal Pindi.

(190) PIPED WATER-SUPPLY FOR THE AHMEDNAGAR CANTONMENT.

The water-supply of Ahmednagar Cantonment up to 1905-06 was obtained by bailing from an open duct, which passed through the Cantonment, and distributing the water in carts. Prior to the redistribution scheme the desirability of providing a regular piped-supply was recognised; but when, under that scheme, the garrison of Ahmednagar was increased by one Battalion of British and one of Indian Infantry, the question of a proper water-supply for the Cantonment became a matter of urgency. In November 1905 the Director-General of Military Works accordingly submitted a project for a piped water-supply, costing Rs 1,61,500 initial and Rs. 4,817 recurring expenditure. The project was framed to provide 120,000 gallons daily for the Cantonment, and to meet the needs of 2,572 Europeans, 7,240 natives, and 1,000 animals ; as also 25,000 gallons daily for Bhingar Town. The project was sanctioned excluding the provision for Bhingar Town, and the estimate reduced by Rs. 8,000. Two years later, however, it became necessary to revise the project and estimates as the number of men and animals had not been correctly calculated, and road watering and certain other requirements had been omitted. Sanction was, therefore, accorded in February 1908 to a revised estimate amounting to Rs. 2,44,000, which would admit of a supply of 175,000 gallons daily. The scheme has now been completed.

(191) PIPED WATER-SUPPLY FOR OTHER CANTONMENTS.

The necessity for providing a piped water-supply in Cantonments, wherever possible, has resulted in such a supply being provided during the past five years at several stations previously without it. In addition to the Ahmednagar scheme above narrated, a piped water-supply was completed in 1908-09 for the Lahore Cantonment ; in which year also the existing piped water-supply at Chakrata was extended to the barracks on the Gobrana and Kailana hills at an estimated cost of Rs. 1,36,000. Piped water installations have also either been completed or are well advanced for the Nowshera Cavalry Cantonment and Jubbulpore.

(192) CENTRAL GUN CARRIAGE FACTORY, JUBBULPORE.

The inception of the scheme for the formation of a Central Gun Carriage Factory dates back to 1896; but it was not till 1900 that the Secretary of State's sanction thereto was obtained. Some time was occupied in preparing the site for the Factory, but no actual construction works were commenced till 1902-03, in which year a sum of six lakhs was provided for the purpose. The measure however pertains to Lord Minto's Administration only in so far as it was completed therein; and it is therefore unnecessary to record here anything more than that the Factory, including quarters for officers and European subordinates, villages for native workmen, etc., has now been practically completed at a cost of about Rs. 25,62,000.

(193) INCREASED ACCOMMODATION DUE TO THE REDISTRIBUTION SCHEME.

The following are the principal stations at which increased accommodation has been or is being provided in connection with the Redistribution Scheme :—

Nowshera Cavalry Cantonment.—Lines for a British Cavalry regiment, a Royal Horse Artillery battery and an ammunition column are still in progress. Public buildings for two Indian Cavalry regiments have been completed. The project for hospital accommodation for the British troops is in progress.

Nowshera.—Accommodation for 3 batteries of Royal Field Artillery, and one Royal Field Artillery Ammunition Column. This project has practically been completed, except hospital accommodation ; and the lines are occupied.

Jubbulpore.—The projects for increasing the hospital accommodation for additional British troops and for providing quarters for officers on the ridge are practically completed. Accommodation for two additional companies of British Infantry has been completed and is in occupation. Lines for an additional Battalion of British Infantry, a battery of Royal Field Artillery, and an Ammunition Column, have also practically been completed and are in occupation.

Ahmednagar.—Lines for an additional battalion of British Infantry are practically completed. The projects for increasing the hospital accommodation for British troops and for officers' quarters are in progress.

Quetta.—Lines including officers' quarters and hospital accommodation for the additional British Infantry battalion have been completed. Lines for a heavy battery of Royal Garrison Artillery are in progress.

Maymyo.—Lines including officers' quarters for a battalion of British Infantry have been nearly completed.

(194) HUTTING OF INDIAN TROOPS.

It was recognised that the type of accommodation now provided for Indian troops under regimental agency was not suitable for the present requirements and it was therefore decided that all lines should gradually be brought up to an improved type by the agency of the Military Works Services. The reconstruction of twenty-one sets of Infantry lines and one set of Cavalry lines, which were in a dilapidated state, was accordingly taken in hand.

(195) SARGODHA REMOUNT DEPÔT.

Buildings for a young stock run and depôt have been nearly completed.

CHAPTER XIII.

REMOUNT DEPARTMENT.

(196) ABOLITION OF THE MIRPUR STUD.

On account of the unsuitability of the locality and the difficulty of supervision in the winter, the small stud for breeding donkey stallions at Mirpur (near Abbottabad) which was established in 1904, has been abolished, the donkey mares being transferred to the stud at Mona.

(197) GRANT OF A BONUS TO AUSTRALIAN HORSE SHIPPERS.

In view of the losses sustained as a result of the draught in Australia in 1902, when a large percentage of foals were lost, a bonus of £3 per horse purchased by Government during the season of 1906-07 has been granted to the shippers who imported the horses, this assistance involving an expenditure of Rs. 1,30,635.

(198) TRANSFER OF THE HEAD-QUARTERS OF THE JHELUM CANAL COLONY CIRCLE FROM MONA TO SARGODHA.

Mona having been found unsuitable for the transaction of the business of the Jhelum Canal Colony Circle, sanction was accorded in 1906-07 to the transfer of the head-quarters of the Circle to Sargodha.

(199) ESTABLISHMENT OF THE SARGODHA REMOUNT dépôt AND RUN.

It having been decided to establish a second young stack dépôt and run of 10,000 acres in the Jhelum Canal Colony, one dépôt and run was established at Mona in 1903-04, and the second in 1907-08 at Sargodha.

The initial cost of these measures is estimated at Rs. 4,04,855, and the eventual recurring expenditure at Rs. 1,19,769. The initial expenditure will be spread over a series of years.

(200) FORMATION OF THE CHENAB CANAL COLONY CIRCLE.

The formation of an additional horse-breeding circle from certain districts formerly comprised in the Jhelum Canal Colony Circle has been sanctioned with effect from 1st November 1906. The new Circle has been styled the Chenab Canal Colony Circle. The measure has involved the addition of one Superintendent, one veterinary officer and certain subordinate staff to the Army Remount Department.

(201) CENSUS OF HORSES SUITABLE FOR ARMY PURPOSES.

With a view to ascertaining the number of horses fit for army purposes which would be available in India in the event of mobilisation, it has been decided to take a census of such horses, and operations commenced in the cold weather of 1907-08.

(202) DEPUTATION OF THE DIRECTOR-GENERAL, ARMY REMOUNT DEPARTMENT, TO AUSTRALIA AND NEW ZEALAND.

The Director-General, Army Remount Department, was deputed in 1907 to Australia and New Zealand to enquire personally into the state of the Australian and New Zealand markets, and to report on the resources of those countries in horses and mules. He was also instructed to enquire into the proposals of the Government of Queensland, regarding the purchase of remounts for India direct from breeders instead of through dealers as at present. In the following year he submitted a detailed report of the results of his enquiries, and his proposals for a change in the system of purchasing remounts are under consideration,

CHAPTER - XIV.

MISCELLANEOUS.

(205-206) MEDALS AND GRATUITIES.

His late Majesty King Edward was graciously pleased to approve of a new medal being struck to commemorate military operations in, or on, the frontier of India, to take the place of the medal granted under Army Order 43 of 1903. The medal is known as the India General Service Medal, 1908, and has a distinctive riband (dark blue edged with green). His Majesty was further pleased to approve of the medal being granted to the troops who formed part of the Bazaar Valley Field Force and Mohmand Field Force. A war gratuity was also granted to the troops engaged in these operations.

(207) ATTACHMENT OF OFFICERS OF THE INDIAN ARMY TO UNITS OF THEIR OWN ARM OF THE SERVICE, WHILE ON LEAVE IN ENGLAND.

With a view to promoting the unity of the Imperial Army, sanction was given to the attachment of a limited number of officers of the Indian Army to units of their own arm for training, while on leave in England.

(208) NEW RULES REGARDING EXAMINATIONS IN RUSSIAN.

With a view to increasing the number of young officers of the Indian Service qualified and available for employment as Russian Interpreters and to attract those possessing the character and qualifications considered indispensable in an employment of this kind, sanction was accorded to revised rules whereby greater inducements as regards travelling expenses, etc., were offered to such officers to qualify as Russian Interpreters. Sanction was also given to 10 officers being officially appointed under certain conditions as Russian Interpreters with an extra allowance of Rs. 100 per mensem.

(209) INSTITUTION OF AN INTERPRETERS' TEST IN ARABIC.

With a view to affording Military and Political officers an opportunity of becoming proficient in Arabic as spoken in the countries in which they may be called upon to serve, sanction was accorded to the institution of an examination in Arabic, known as the Interpreter's Test, rules regarding which have been promulgated.

(210) ANNUAL CONFERENCES OF SENIOR STAFF OFFICERS.

Following the practice at home these Conferences have been instituted in India and have proved of great educative value from the point of view of smooth staff work in peace and war. Two such conferences have been held, one at Agra in January 1909, and one at Dehli in January 1910, the latter being preceded by a Staff tour.

(211) EXAMINATIONS IN HINDUSTANI.

Experience having proved the present tests to be both unsuitable and out of date, these examinations are being revised and made more practical (parti-

cularly from a colloquial point of view) in collaboration with the Home Department.

(212) INTERCHANGE OF OFFICERS WITH AUSTRALIA AND CANADA.

The system of interchange of officers with the dominions is now firmly established and has been of great advantage in promoting a sense of the homogeneity of the forces of the Empire. In the case of Australia, the officers exchanged have not only been *staff* officers, but it has also been possible to arrange an actual exchange of duties.

(213) INTRODUCTION OF THE HOME SYSTEM OF PHYSICAL TRAINING IN INDIA.

A new system of Physical Training having been introduced at Home in 1908, special classes of instruction, under officers and non-commissioned officers who were sent to Aldershot for a course, are being held this year with a view to its introduction in the Army in India.

(214) MUSKETRY COURSES. INDIAN TROOPS AND VOLUNTEERS.

The musketry courses hitherto prescribed for the Indian Army and the Volunteer Force in India have been modified to assimilate them to the courses fired at Home by British troops and the Territorials.

(215) VISIT OF THEIR ROYAL HIGHNESSES THE PRINCE AND PRINCESS OF WALES TO INDIA.

Their Royal Highnesses the Prince and Princess of Wales, now Their Majesties King George and Queen Mary, arrived at Bombay on the 9th November 1905, and, during the progress of the Royal tour, the Prince reviewed, at the various stations visited, a large number of troops, British, Indian, and Imperial Service. After leaving Bombay, Indore, Udaipur, Jaipur, and Bikanir, were visited in turn, the Royal party arriving at Lahore on the 28th November, where on the 1st December a review of a considerable body of Punjab Imperial Service Troops was held. Peshawar was next visited, and the Khyber Pass and Landi Kotal inspected. Hasan Abdal was reached on the 5th December, Their Royal Highnesses attending the manœuvres held about Kala-ke-Sarai. On the 8th December His Royal Highness inspected the troops assembled for the Rawal Pindi manœuvres, on the Khanna plain, when 55,516 officers and men, 282 guns, 13,396 horses, and 14,461 transport animals passed in review. While at Rawal Pindi His Royal Highness also inspected the camps and was present at an exhibition of inventions and novelties and an ordnance exhibition. From Pindi the Royal party proceeded in succession to Jammu, Amritsar, Delhi, Agra, Gwalior, and Lucknow. At Amritsar, the Golden Temple and the Saragheri memorial were visited, and at Delhi the various places of interest, the mutiny veterans being inspected at Lucknow. Calcutta was reached on the 29th December, whence Their Royal Highnesses proceeded to Rangoon, Mandalay, Madras, Mysore, and Bangalore. On the 9th February 1906 a parade of troops was held at Secunderabad. On the 21st February, while at Benares, medals of St. John of Jerusalem were presented to officers and men of the Gurkha regiments and others for good work done during the Dharamsala earthquake, and on the 24th February the Prince and Princess were present at the assault-at-arms of the 8th Division at Lucknow. On the 10th March Quetta was reached, Fort Lockhart and Chaman being likewise visited. Their Royal Highnesses arrived at Karachi on the 17th March from whence they embarked

for England on the 19th March. Honorary distinctions were conferred on the following Indian regiments in connection with the Royal visit :—

- 6th Prince of Wales' Cavalry.
- 11th Prince of Wales' Lancers (Probyn's Horse).
- 102nd Prince of Wales' Own Grenadiers.
- 2nd Prince of Wales' Own Gurkha Rifles.
- 18th Tiwana Lancers.
- 26th Light Cavalry.
- 38th and 39th Central India Horse.
- 1st Sappers and Miners.
- 14th Ferozepore Sikhs.
- 61st Pioneers.
- 130th Baluchis.
- 1st Gurkha Rifles.
- 127th Baluchis.

(216) VISIT OF HIS EXCELLENCY THE COMMANDER-IN-CHIEF TO NEPAL.

His Excellency the Commander-in-Chief, Lord Kitchener, in 1906 accepted an invitation from the Durbar to visit Nepal. A review of 19,500 troops was held, and a durbar also took place at which the Maharaja Dhiraj was present. During the visit, questions relating to Gurkha recruiting were discussed.

(217) VISIT OF HIS MAJESTY THE AMIR OF AFGHANISTAN TO INDIA.

The Amir of Afghanistan arrived at Peshawar on the 2nd January, 1907, and during the progress of his tour in India His Majesty reviewed a large number of troops—British, Indian and Imperial Service—at the various stations visited. At Nowshera and Rawal Pindi, where halts were made on his journey to Agra, he saw the local garrisons on parade. On the 12th of January a review of the 7th (Meerut) and 8th (Lucknow) Divisions, and the 7th and 8th Cavalry Brigades together with a complement of Corps Troops was held in his honour at Agra. He was present at a field day on the 14th January and witnessed a combined Cavalry and Artillery display, after which he closely inspected the various branches of artillery engaged and was shown over the camps of the troops concentrated at Agra. When *en route* to Gwalior, various manufactories at Cawnpore were visited, including the Government Harness and Saddlery Factory. On the 19th of January he reviewed the Maharaja Scindia's army at Gwalior, including his Imperial Service Cavalry and Infantry. During his stay at Calcutta he, on the 30th of January, visited the Cossipore Gun and Shell Factory, the Dum Dum Ammunition Factory, and the Ishapore Rifle Factory, having many details of a technical nature explained to him. While at Bombay—where the programme was mainly of a naval nature—he saw gun practice at the forts, and also visited Poona. On his return journey to Peshawar from Karachi he inspected one of the forts at Rawal Pindi and was shown over the arsenal at that place. He left India on the 7th of March on his return to Kabul.

The Amir's visit to India is believed to have opened his eyes to the defects of his own forces, and it is probable that some efforts to improve them will be

made. Large numbers of short Lee-Enfield rifles for the Afghan army are being imported from England.

(218-219) RIFLES FOR THE NEPAL DURBAR.

In September 1907, the Nepal Durbar asked for permission to purchase from the Government of India 10,000 M. H. rifles and to import certain machinery for the manufacture of arms and ammunition. In reply to this request 2,500 rifles were sent to the Nepal Government as a gift, and they were informed that the balance of the 10,000 would be supplied upon the Prime Minister's return from his projected visit to England. The Prime Minister sailed from Bombay on the 19th April 1908, and arrived in London on 8th May 1908, where he was cordially received. The rifles have now all been supplied.

(220) CANTONMENT MAGISTRATES.

With a view to affording an opening to Indian officers of the army a scheme was approved for the appointment of these officers to the Cantonment Magistrates' Department in the capacity of Extra Assistant Cantonment Magistrates. In addition to the Indian officers being most useful for the work required of them in their new capacity, the scheme will afford an outlet to deserving officers, which will greatly benefit the Indian army. The scheme is in the experimental stage at present, only three appointments of Extra Assistant Cantonment Magistrates having been sanctioned; but if the measure proves a success it will be gradually extended.

(221) ACQUISITION OF LAND FOR RIFLE RANGES, GRASS FARM, ETC., AT THE NOWSHERA CAVALRY CANTONMENT.

To complete the requirements of the new Cavalry Cantonment at Nowshera, it was necessary to acquire about 1,365 acres for rifle ranges, camping ground, railway station, *bazaar*, riding school, and Veterinary hospital; and a further area of 1,113 acres to supply grass for the horses of the garrison. The total cost of the land was estimated at Rs. 84,876, which was provided for its purchase in 1910-11.

(222) EXPERIMENTAL ESTABLISHMENT OF AN ARMY CLOTHING FACTORY AT FATEHGARH.

A factory was established at Fatehgarh as an experimental measure in December 1905, but was closed on the 31st March 1907, since on further consideration a third Army Clothing factory was found unsuited to existing means and requirements.

(223) HELMETS FOR BRITISH TROOPS.

The helmets at present supplied by Messrs. Almond and Smith having disclosed sundry defects, steps are being taken to reduce their period of wear and to procure helmets of a more lasting quality.

(224) ABOLITION OF "BRODRICK" CAPS.

These caps have been abolished both in England and in India, and steps are being taken to revive the former field service (or Austrian) cap for India.

(225) REINTRODUCTION OF KNEE BOOTS.

These boots were abolished for the whole of the Royal Artillery in September 1905, but have now been reintroduced for Royal Horse Artillery.

(226) TRAINING OF SERGEANT MASTER SHOEMAKERS.

The standard of training in India of soldiers undergoing courses of instruction in shoemaking has been raised to that obtaining in England, so that the certificates granted in England and India will be regarded as equal, and men trained in India will be considered qualified for the appointment of master shoemakers at home.

(227) ADDITIONAL OFFICERS FOR THE ARMY CLOTHING DEPARTMENT.

Owing to the increase of work and the paucity of officers in the Army Clothing Department, the Right Hon'ble the Secretary of State has been asked to sanction the appointment of two officers of the rank of Captain, as Assistant Superintendents.

(228) RESERVE FORCES ACT.

Regulations, under the Reserve Forces Acts, for the governance of an Indian Section of the Army Reserve were drawn up and have received the approval of the Right Hon'ble the Secretary of State.

The Indian Section will, it is proposed, originally consist of a fixed number of European or Eurasian employés (engine-drivers, etc.) of Indian railways who can be called up on the outbreak of war.

(229) INDIAN ARMY BILL.

The law relating to the Indian Army has recently been found to require amendment in the following respects :—

- (a) Corporal punishment.
- (b) The law relating to enrolment and attestation.
- (c) The contingency of units of the Indian Army serving outside of India in time of peace.
- (d) The recent abolition of the "commands" and the reorganisation of the army in divisions and independent brigades, rendering various provisions of the existing law obsolete, etc.

It has long been felt that the Indian Articles of War, in spite of the amendments which have been made in them since they were originally enacted as Act V of 1859, are unsuited to modern requirements and need to be entirely recast. These Articles are obscure and often defective, while their arrangement is confusing and practical difficulties in their working are of frequent occurrence. The opportunity has therefore been taken to prepare an entirely new Code instead of merely amending the existing Articles on the special points indicated.

The draft of the new India Army Bill has been forwarded to the Secretary of State, who has sanctioned the Bill being introduced into the Legislative Council during the present Simla session.

CHAPTER XV.

ADMINISTRATION OF THE ROYAL INDIAN MARINE.

(230) NAVAL COMMANDER-IN-CHIEF AND DIRECTOR OF THE ROYAL INDIAN MARINE.

The following officers held the appointment of Naval Commander-in-Chief of the East Indies Squadron during the Viceroyalty of Lord Minto :—

Vice-Admiral Sir Edmund S. Poë, K.C.V.O., till February 1907.

Rear-Admiral Sir George J. S. Warrender, Bart., C.V.O., C.B., from February 1907 to April 1909.

Rear-Admiral Edmond J. W. Slade, M.V.O., from April 1909 to date.

During the same period the following held office as Director of the Royal Indian Marine :—

Captain, afterwards Rear-Admiral, G. H. Hewett, R. N., C.I.E., till March 1909.

Captain W. Lumsden, R. N., A.D.C., from March 1909 to date.

(231) CONSTRUCTION OF NEW VESSELS.

Owing to her age and unsuitability for further service, as also to her inability to cope with modern trooping requirements, it was decided in 1905-06 to replace the R. I. M. S. "Canning", which had been built in 1882, and which up to then had done good service. Accordingly, provision was made in the Home estimates of that and the following years for the construction of a new vessel, which was completed at a total cost of £140,000, and sent out in 1906-07 and named the "Northbrook". The new vessel having been duly commissioned for service, the "Canning" was sold. The "Northbrook" has since her commission been usefully employed in Colonial and Indian trooping.

In 1905-06 it was also decided to replace the two old vessels, *viz.*, the "Investigator" and "Nancowry", used for the purposes of the Marine Survey of India. The former had been built in 1881, and was past the due performance of the important work required of it, while the latter, originally built for the Nicobars, and infected with beri-beri, was not a very suitable vessel for Marine surveying. It was hoped that it might be possible to purchase a vessel in all respects fitted for Marine Survey work, to replace the "Investigator," but this was not realised, and provision was accordingly made in the Home Estimates of 1906-07 to build a new vessel. In the previous year orders had been placed in England for the construction of a vessel to replace the "Nancowry". The two new survey vessels, which were respectively named the "Investigator" and "Palinurus," arrived in India in 1907; whereupon the old "Investigator" was sold, and the "Nancowry" made over to the Port Blair administration.

Up to April 1906 a steam launch, named the "Sakka", was employed at Aden for the carriage of fresh water. On being taken to Bombay for survey, the launch was condemned as unserviceable, and it was decided to build a new launch to replace it at a cost of Rs. 50,000. Pending the construction of a new launch arrangements were made by private contract for the conveyance of fresh water. The new launch was ready in 1907 and named the "Sakka II".

In 1905-06 the question of the number and type of launches available at Rangoon for Royal Garrison Artillery and Port Defence Volunteer purposes had to be considered. The requirements of the Volunteers were met by the hiring of a suitable launch, but as regards the Royal Garrison Artillery it was recognised that a new and powerful target-towing launch with good transport facilities was required. Accordingly a sum of Rs. 1,25,750 was provided for the purpose in the estimates of 1907-08. The new launch was completed in about 9 months, and named the "General Elles."

So far back as 1903 the Director, Royal Indian Marine, represented that the tug "Elephanta" belonging to the Bombay yard craft and which was used for towing large vessels out of harbour, had become unserviceable. She had been purchased second hand in 1867, and had become worn out through continuous wear and tear. A sum of one lakh was accordingly provided for the construction of a new tug of similar size and power, but before the work was put in hand doubts arose whether the proposed vessel would be sufficiently powerful to handle with safety ships of the "Dufferin" "Hardinge" and "Northbrook" types. Accordingly on reconsideration, it was decided to construct a more powerful tug at an estimated cost of Rs. 2,09,588. Owing to lack of funds nothing could be done until 1908-09, when work on the new tug was commenced. The new "Elephanta" is nearing completion and will be ready for work early in 1911. A gunner of the Royal Indian Marine is to be placed in command.

The "Elphinstone," a station-duty vessel, having nearly reached the age limit of 25 years, and having become worn out by continuous service, the necessity for replacing her was accepted in 1908, and the Director, Royal Indian Marine, asked to submit proposals for the construction of a new vessel in her place. Proposals were accordingly submitted in 1909; but owing to financial considerations, and also because the question of reducing the Royal Indian Marine had meanwhile arisen, it was decided to postpone the construction of a new vessel. In 1910, the question of reducing the Royal Indian Marine having been abandoned for the present, proposals for replacing the "Elphinstone," at a cost of £ 61,200, were again submitted and are now under consideration.

Sanction was accorded in September 1907 to the construction in England at a cost of £63,150, of a second steam vessel for the Bengal Pilot service, of a type similar to the "Fraser." The Bengal Government who were to provide the cost, pointed out that the old brig system had become obsolete, that the "Fraser" fitted with wireless telegraphy and modern requirements had given general satisfaction, and that the efficiency of the pilot service required that the vessels of the old type still left should be replaced. These representations were accepted by the Government of India as sufficient justification for the construction of the new vessel which has now been completed and named the "Lady Fraser".

Sanction was accorded in 1908-09 to the construction in the Royal Indian Marine dockyard, of a vessel to replace the "Rosamond" belonging to the Port Blair administration. The new "Rosamond" has just been completed, and is being sent to Port Blair.

Five launches have been constructed for the Government of Persia at the Bombay Dockyard.

Two launches for the Mohammerah and Bahrein Consulates have been constructed and despatched to their destination, and sanction has been accorded to the construction of a launch for the Political Agent at Koweit. This was completed in 1908-09 and duly despatched to her destination.

(232) RETENTION OF THE GOVERNMENT FLOTILLA FOR THE IRRAWADDY.

At the end of 1905, the Royal Indian Marine vessels employed more especially for the necessities of Upper Burma were the "Sladen", the "Bhamo", and the "Irrawaddy". This fleet, got together in 1886, had been employed as an armed flotilla which aided the military operations in Upper Burma. The vessels comprising it had not been constructed for the conveyance of troops, but after the pacification of the province, having no other duties to perform, they have been employed continuously in the conveyance of troops and stores between Rangoon, Mandalay and places north of the latter place, and for such duties as the Civil Administration from time to time required. As the province was opened up however, the sphere of its activities was gradually narrowed, and the question as to the necessity for the retention of the Royal Indian Marine flotilla had to be considered. In 1900 it was decided that the Railway and Irrawaddy Flotilla Companies should ordinarily be employed for the conveyance of troops and stores between Mandalay and Bhamo, and that the Government service of steamers should be retained to reach stations north of Mandalay and south of Katha which are not served by the Railway, and should ply above Katha only under exceptional circumstances. On this basis the Government Flotilla for the Irrawaddy continued till the end of 1905, when the Director, Royal Indian Marine, submitted proposals for the replacement of the R. I. M. S. "Irrawaddy" built in 1876 and no longer worth repairing. This again raised the whole question of the *raison d'être* of the Government Flotilla, and the discussions which followed showed considerable difference of opinion as to whether its retention was necessary. It was thought, however, that the abolition of the Government Flotilla would create a monopoly in favour of the Burma Railway, and the Irrawaddy Flotilla Company, which might take advantage of it to raise their carrying rates to the detriment of Government, and mainly on this ground it was decided early in 1906 to replace the R. I. M. S. "Irrawaddy" at a cost of 2½ lakhs, when funds became available. In August 1906, however, the Director, Royal Indian Marine, submitted revised designs for a vessel costing nearly 4 lakhs to which Government demurred, and meanwhile the question of constructing the new vessel was again postponed, at the instance of the Quartermaster General in India who was instituting independent enquiries as to the value of the Government Flotilla for the carriage of troops and Government stores. Protracted enquiries were then made locally as to the rates at which the Burma Railway and the Irrawaddy Flotilla Company would be willing to carry troops and stores on behalf of Government, as also into the actual duties performed by the Royal Indian Marine Flotilla; and it was discovered that troops and stores were carried therein all the way from Rangoon to Mandalay and further north, not because it was the best or cheapest arrangement, but because justification had to be found for the existence of these Government vessels. Under these circumstances it was decided not to replace the "Irrawaddy" and that the further retention of the Royal Indian Marine Flotilla for Upper Burma should be contingent on suitable terms being arrived at with the Burma Railway and the Irrawaddy Flotilla Company.

(233) ABOLITION OF THE TORPEDO BOATS AT BOMBAY.

When Lord Minto assumed office there still existed, as part of the defences of Bombay harbour, three torpedo boats belonging to the Royal Indian Marine, and named respectively the "Baluchi," "Karen," and "Pathan." These had been built in 1887, and were the remains of the old defence squadron, which, on the advice of the Admiralty and Imperial Defence Committee given in 1901, had been abolished in the following year. The Admiralty also in 1901 recommended the abolition of the three torpedo boats named above as being no longer required for the defence of Bombay harbour, and they repeated their opinion in 1902, but the recommendation was not acted upon pending the installation of electric lights and quick-firing guns for those defences. The three torpedo boats therefore continued in existence, but owing to the difficulty of getting skilled torpedo ratings for them, they were lying idle, inefficiently manned and unused, and were costing the Marine Estimates a sum of Rs. 24,000 yearly for their upkeep. The whole question of the necessity for their upkeep arose again in 1905, and the part they would be assigned in the defence of Bombay was reconsidered. It was ascertained that to keep the boats effective, skilled personnel would have to be employed, and the cost of maintaining them would thereby increase to Rs. 1,80,000 a year. The Admiralty re-iterated their opinion that these torpedo boats at Bombay could not be regarded as an important element in the defence of the port and that they could be dispensed with without impairing the efficiency of the defences. In these circumstances the Government of India decided in 1906, on the advice of the Indian Defence Committee, that it was not advisable to spend Rs. 1,80,000 a year on maintaining the boats in an efficient condition, and that they should be abolished, as were the Turret ships in 1902. They were accordingly sold in 1907.

(234) DISPOSAL OF THE MINING FLOTILLA ON THE ABOLITION OF THE MINEFIELDS.

The abolition of minefields at the various defended ports was sanctioned in September 1907, and the question accordingly arose as to the disposal of the Royal Indian Marine vessels maintained for submarine mining purposes. Ten vessels of various types were maintained at Karachi, fifteen at Bombay, five at Calcutta, and twelve at Rangoon. The Director of the Royal Indian Marine in November 1907 submitted proposals to meet the altered conditions as to the defence of Indian ports ; and after due consideration of the requirements of the several ports, the Government of India in 1908 decided that five vessels only, of various types, should be retained at Karachi, six at Bombay, five at Calcutta, and five at Rangoon. The vessels so retained were not to be at the exclusive disposal of the officer in charge of defence lights at the various ports, but were to be "pooled" along with other Government craft used for military purposes, and the whole placed at the disposal of the General Officer Commanding at the port for army purposes generally, as considered necessary. Of the vessels no longer required by the abolition of the minefields, some were sold, and the rest transferred to other duties.

(235) PORT AND SHORE APPOINTMENTS.

The following appointments were in 1905-06, reserved for officers of the Royal Indian Marine :—

- 1st Assistant Port Officer, Rangoon.
- Port Officer, Chittagong.

Assistant to the Engineer and Shipwright Surveyor and Superintending Engineer, Burma.

Engineer and Harbour Master, Port Blair.

In 1906-07 the following appointments were created, and were also reserved for officers of the Royal Indian Marine.

- (a) Engineer and Shipwright Surveyor to the Government of Eastern Bengal and Assam.
- (b) Third Engineer and Shipwright Surveyor, Port of Calcutta.

In 1907-08 the appointment of Port Officer, Karachi, was graded as a first class port appointment. The appointments of Engineer and Harbour Master, Port Blair, and Superintending Engineer, Mandalay, were brought, at the same time, on to the active list of the Royal Indian Marine.

Sanction was accorded in 1908-09 to the abolition of the post of 2nd Assistant Shipping Master, and to the creation of the appointment of Deputy Port Officer and Deputy Shipping Master for the Port of Calcutta, to be reserved for an Executive Officer of the Royal Indian Marine ordinarily of the rank of 3rd grade Commander.

(236) APPOINTMENT OF A CONSTRUCTOR.

The increase of work in the Bombay dockyard has necessitated assistance being given to the chief constructor, and a constructor has been appointed on a salary of Rs. 600-40-800 a month.

(237) CHANGE IN DESIGNATION OF THE PROFESSIONAL STAFF.

Owing to the changes which have taken place in the methods of shipbuilding since the early eighties, the designations of some of the professional staff of both dockyards have been altered to indicate the nature of the duties they now undertake, for example:—

Chief builder now styled Assistant Constructor.

Foreman of the Factory now styled Engineer in charge of the Factory.

Builder's foreman now styled Foreman of the Yard.

Assistant Boilermaker now styled Assistant Foreman Boilermaker.

The precedence of the officers and staff of the dockyards has also been revised.

(238) RECRUITMENT OF ENGINEER OFFICERS.

Hitherto all officers (executive and engineer) have been recruited from England. Pending a decision on a proposal to recruit engineers partly from England and partly locally, the Secretary of State has agreed to the temporary engagement of two engineers locally. The proposal has however fallen through.

(239) APPOINTMENT OF AN OFFICER OF THE ROYAL INDIAN MARINE TO THE CHARGE OF THE MARINE SURVEY OF INDIA.

In order to satisfy the legitimate aspirations of officers of the Royal Indian Marine many of whom were highly qualified as Marine Surveyors, it was

decided in 1905, that on the expiration of the term of office of the Royal Navy Officer who was then in charge of the Marine Survey of India, that an officer of the Royal Indian Marine should be placed in charge thereof, as an experimental measure. It was further decided by agreement with the Admiralty that during the annual recess of the Marine Survey of India, this officer should be attached to the Hydrographic Branch of the Admiralty. Accordingly in 1907, Commander W. G. Beauchamp, R. I. M., was appointed to succeed to the charge of the Marine Survey of India, for a term of 3 years, extensible to 5 years. Commander Beauchamp having expressed his desire to retire after 3 years, and the experiment having proved a success, the Secretary of State has agreed to another Royal Indian Marine Officer being placed in charge.

(240) CONCESSIONS TO ROYAL INDIAN MARINE OFFICERS.

A local allowance of Rs. 100 has been sanctioned for officers of the Royal Indian Marine holding shore appointments in Burma and whose emoluments do not exceed Rs. 1,000 per mensem. Sanction has also been accorded to the grant of subsistence and travelling allowances to engineer officers of the Royal Indian Marine who obtain the Board of Trade certificate of an Engineer and Shipwright Surveyor while on leave in England.

(241) ROYAL INDIAN MARINE OFFICERS.

The engineer officers of the Royal Indian Marine of 9 years' seniority having represented the stagnation of promotion and meagreness of their prospects, a recommendation was made to the Secretary of State for India for the increase of pay and leave pay of Junior Chief Engineers and for the creation of two new grades of seniority for engineer officers, with increased pay and leave pay. This has been sanctioned by the Secretary of State.

(242) ENTERTAINMENT OF OFFICERS AND MEN OF SHIPS AND SQUADRONS OF FOREIGN NAVAL POWERS.

In connection with the question of hospitality to be offered to the officers and men visiting Indian ports with the ships and squadrons of foreign naval powers, when such occasions are invested with an international character, it has been decided that responsibility for the entertainment will ordinarily devolve upon the Local Government, and, in the case of Calcutta, on the Government of India when there present. In cases where the officers of the Royal Indian Marine are called upon to take direct action in connection with these entertainments, the Director of the Royal Indian Marine has been authorised to incur expenditure to a reasonable amount.

(243) EMPLOYMENT OF THE "HARDINGE."

The "Hardinge" was employed during March 1907 for the conveyance of Their Royal Highnesses the Duke and Duchess of Connaught and party from Rangoon to Aden via Calcutta and Colombo.

(244) WITHDRAWAL OF ARMAMENT FROM ROYAL INDIAN MARINE SHIPS.

The machine gun armament of certain Royal Indian Marine ships has been withdrawn and it has been decided to convert the guns to .303 gauge and store them in arsenals..

(245) DISPOSAL OF VESSELS BY LOCAL GOVERNMENTS.

As a measure of decentralisation, Local Governments have been authorised to condemn and dispose of such of their vessels as may, from time to time, become unserviceable or superfluous, subject to the proviso that the question of condemnation or disposal of any vessel, the cost of which is likely to exceed Rs. 1,00,000, will be referred to the Government of India.

(246) PROHIBITION OF PRIVATE WORK IN ROYAL INDIAN MARINE DOCKYARD WORKSHOPS.

It has been decided that no private work of any description shall be executed in Royal Indian Marine Dockyard workshops. Private work will however be allowed, under certain conditions for officers of the Royal Navy and Royal Indian Marine.

(247) PROCEDURE FOR MAKING PROVISION IN THE MARINE ESTIMATES.

Revised procedure has been laid down for adoption in making provision in the budget estimates of the Royal Indian Marine for wages of artificers and labourers in dockyards and for the local purchase of stores for such dockyards.

(248) NAVAL BASIN AT BOMBAY.

The proposal made by the Committee presided over by Major-General H. C. Slater, C.B., regarding the reservation of an area for the formation of a Naval Basin at Bombay, having been fully considered by the Government of India and referred to the Lords Commissioners of the Admiralty, the latter came to the conclusion that the contemplated reservation was unnecessary. This question has accordingly been dropped.

(249) ASSOCIATION OF THE CAPE AND EAST INDIES SQUADRONS AND APPOINTMENT OF A COMMODORE TO THE COMMAND OF THE LATTER SQUADRON.

The East Indies Squadron has been associated with the Cape Squadron and an Admiral placed in supreme command of the two squadrons. An officer of the rank of Commodore of the 1st Class has been appointed to the command of the East Indies Station and the ships of the two squadrons have been made interchangeable. This arrangement, however, will not in any important respect alter the existing relations of the East Indies Command to the Government of India.

(250) ADMIRALTY SCALE OF RATIONS.

Sanction has been accorded to the adoption of the Admiralty scale of rations on board Royal Indian Marine vessels carrying British troops.

(251) LEASE OF THE ARTHUR BUNDER COAL DEPÔT.

The Government of India have taken from the Trustees of the Port of Bombay a lease of the depôt for fifty years from the 1st June 1906, and have sub-let it to the Admiralty for five years from the same date.

(252) NAVAL STORAGE ACCOMMODATION AT BOMBAY.

Under the revised arrangements with the Home Government a sum of Rs. 22,664 is recoverable from the Admiralty annually for accommodation for

naval ordnance stores, including the use of a wharf and cranes in the Ordnance Depôt and a share of the cost of guards. The amount to be paid by the Admiralty for the additional accommodation provided in the Dockyard for Naval Marine Stores on the closing of the naval depôt at Trincomalee is under settlement.

(253) SUPPRESSION OF ARMS TRAFFIC IN THE PERSIAN GULF.

Vigorous action was taken to put a stop to the arms traffic in the Persian Gulf, and in April 1908 the "Proserpine" succeeded in capturing near Jask about 1,500 rifles and a large quantity of ammunition. Endeavours were continued during 1908-09, when H. M. S. "Fox" captured two dhows, one off Jask and the other off Ras-ash-Shir, containing large quantities of arms and ammunition. A complete account of the Arms Traffic operations in which the "Hardinge" and "Minto" have also been usefully employed, will be found in Chapter V.

(254) NUMBER OF VESSELS REQUIRED FOR STATION-DUTY.

In connection with the proposals for replacing the "Elphinstone," a station-duty vessel, the question has arisen as to the number of vessels actually, under present conditions, required for station duty. Vessels are required for the purpose at four stations, *viz.*, Aden, Port Blair, Rangoon, and the Persian Gulf; but five vessels are actually available, *viz.*, the "Elphinstone," "Lawrence," "Minto," "Mayo," and "Dalhousie," the last being used as a reserve to replace any of the other four when away for docking, and also occasionally for transport purposes. The necessity for having a vessel in reserve is under consideration, and also whether it would not be possible to temporarily replace any of the four vessels actually required by a less costly method. Further, as the station vessel at Rangoon is mainly used for visiting light houses and conveying the Lieutenant-Governor, duties which are carried out at Calcutta, Madras, Bombay, and Karachi without the provision of a special vessel, the Director, Royal Indian Marine, has been asked to justify the retention of a vessel at Rangoon for such duties at an annual cost of $1\frac{1}{2}$ lakhs. The Director has now produced ample justification for the retention of five vessels, and it is probable that the question will be dropped.

(255) SCHEME FOR BUILDING LARGE VESSELS IN INDIA.

In 1910 the Director, Royal Indian Marine, Captain W. Lumsden, submitted for consideration an elaborate and carefully worked out scheme for rendering the Bombay Dockyard capable of building in India the larger type of vessels required for the purposes of the Royal Indian Marine. His scheme contemplated the enlarging and extending of the Bombay Dockyard at an initial cost of £22,000 for plant, machinery, and building works, and an annual recurring cost of nearly Rs. 30,000 for the addition of a highly skilled and expert construction and Engineering Staff. Captain Lumsden showed that by carrying out these improvements in the constructive capacity of the Bombay Dockyard, the larger vessels required for the Royal Indian Marine could be constructed in India at an average cost of about £6,000 less than in England, and that as several of the larger vessels were approaching the age limit of 25 years, and would have to be replaced in the next few years, the total saving to Government would be considerable.

These proposals were considered in detail by the Government of India, both from an administrative and a financial point of view; but the difficulties in the way of their adoption were considered to be insurmountable. Among the many objections to the scheme were the following:—

- (a) Money was not at present available.
- (b) The ship building industry had long ceased in India, and men would have to be trained to it. In England we had ready to hand the best ship building facilities in the world.
- (c) No great strategical reasons existed for making India self-sufficing in the matter of ship building.
- (d) There was no guarantee that if such an industry was created, at great cost, in India, continuous employment could be found for it.
- (e) The margin of profit was too small to justify speculation.

(256) REDUCTION OF THE ROYAL INDIAN MARINE.

In 1905 the War Office put forward a proposal that the sea transport requirements of the Army should be dealt with as a whole, the management of the Indian trooping service being handed over to them. Thereupon the question naturally arose as to whether it would not be practicable and economical to carry out the entire trooping between India and England and the Colonies by Royal Indian Marine vessels. In the discussions which then ensued, the question of the cost of maintaining the Royal Indian Marine was reviewed, as compared with the cost of carrying out Government transport work by hired vessels. It was argued that Royal Indian Marine vessels were used for transport work in Indian waters not because that was the cheapest arrangement, but because the vessels being in existence, their existence had to be justified. Thereupon in 1908, Lord Kitchener ordered the question of the reduction of the Royal Indian Marine to the limits of our actual requirements to be considered independently of the question of general trooping arrangements out of which it had arisen.

The whole *raison d'être* of the Royal Indian Marine was then exhaustively considered, and it was shown that the actual transport of troops in Indian waters was only a small part of its multifarious duties. The Royal Indian Marine has to perform numerous and important duties for the Royal Navy vessels of the East Indies Squadron, for local Governments, and for the political services in Persian and Arabian waters. The head of the service is the expert adviser of the Government of India and the local maritime Governments on the numerous maritime services rendered imperative by the necessities of a great commercial country like India with its extensive sea board. The Royal Indian Marine is responsible for the guarding of overseas convict settlements, the suppression of piracy, the visiting of lighthouses, the relief of distressed or wrecked vessels, the survey of the coasts and harbours of India and Burma, the issue of notices to mariners, the publication of registers of wrecks and casualties, and of lighthouses. It has various important duties to perform in time of war to the Royal Navy, and its Head is Naval Intelligence officer for mobilisation and war purposes. Under existing arrangements

two of its largest vessels have, in the event of a naval war breaking out, to be made over to the Royal Navy for employment as cruisers under the orders of the Naval Commander-in-Chief, East Indies Squadron. There is further the great advantage of having Government dockyards where vessels of the Royal Navy can be repaired and refitted both during peace and war ; and merely for trooping purposes, it is advisable to have a certain number of Government vessels which could always be available at short notice in times of emergency. Moreover, for high State ceremonial purposes, Government vessels would always be needed. Incoming and outgoing Viceroys have for a part of the voyage to be provided with State vessels. The Viceroy and Heads of Local Governments must also be so provided on tours of State, as must also distinguished Royal visitors of all countries.

The retention of the Royal Indian Marine having been shown to be a necessity the question was thus narrowed down as to whether some reduction in its transport duties might not prove economical. No great financial advantage having been conclusively established, His Excellency the present Army Member decided in 1910, that the question need not be further considered for the present, in view of the obvious advantage of having vessels available for trooping at all times at short notice.

(257) EMPLOYMENT OF ROYAL INDIAN MARINE VESSELS ON HOME TROOPING.

The systematic trooping duties of the Royal Indian Marine have almost exclusively been limited to Indian and Colonial requirements for the transport of troops ; and it has only been very rarely that a Royal Indian Marine vessel has been employed in carrying troops between India and England. In 1909 the Government of India put forward a definite proposal to the Secretary of State that one vessel of the Royal Indian Marine should be properly fitted up and used regularly for Home trooping in place of one of the hired transports now employed. It was pointed out that this arrangement would result in a considerable economy of about £30,000, that it would meet War Office requirements, and would be an administrative convenience. To this representation the Secretary of State replied, in March 1910, that there were legal objections to the systematic employment of Royal Indian Marine vessels outside Indian waters, that these vessels were built for local Indian requirements and presumably were not surplus to those requirements, that it would add to the difficulty of receiving tenders from suitable shipping firms, and that the occasional employment of a Royal Indian Marine vessel would not be overlooked. The question has been further considered, as the arguments of the Secretary of State can be suitably met ; and it is possible that a further representation will be made to him.

(258) NEW SYSTEM OF MARINE ACCOUNTS.

Early in 1908, advantage was taken of the presence in India of Messrs. Davison and Harvey, who had been deputed from England for service on the Committee on Indian Ordnance Factory Accounts, to assemble another Committee, including these two officers to investigate the system of Accounts in the Royal Indian Marine dockyards. The other members of the Committee thus constituted were the Director, Royal Indian Marine as President, and Lieutenant-Colonel T. A. Harrison of the Military Accounts Department. The

Committee dealt exhaustively with the whole question, and submitted their report in March 1908, wherein they showed that the then system of Marine Accounts failed to indicate the true cost of dockyard operations, and submitted various proposals to remedy the defects. These were considered in detail, and various decisions were arrived at, among the principal of which were the abolition of the appointment of Examiner of Marine Accounts, the appointment of a Chief Accountant for the Bombay Dockyard, and of an accountant at Kidderpore. The Accounts of the two dockyards will be prepared under the general direction of the Director, Royal Indian Marine ; and the whole of the accounts of the Royal Indian Marine will be under the general audit and control of the Controller of Military Supply Accounts who, for marine purposes, was constituted Controller of Marine Accounts. These arrangements came into effect from the 1st April 1910, and were duly communicated to the Secretary of State.

(259) LIGHTING AND BUOYAGE OF THE PERSIAN GULF.

For some few years past the question of the better lighting and buoyage of the Persian Gulf has been engaging the attention of His Majesty's and the Indian Governments. The question is very largely political in character, but inasmuch as the Indian moiety of any expenditure which may be incurred to attain the objects in view will be debitible to the marine estimates, it is necessary briefly to state the position, which is this. In view of German attempts to further their shipping interests in the Persian Gulf, and of the increasingly severe competition which is being brought to bear on British shipping, it was recognised by the Home and Indian Governments that steps are necessary to preserve our shipping position in the Persian Gulf. Accordingly in 1909, at the instance of Sir Edward Grey, and with the concurrence of Lord Morley, a Committee, consisting of a Trinity House Expert, Colonel P. Z. Cox, Commander Litchfield, R. N., and Commander Beauchamp, R. I. M., was appointed to consider the whole question of the better lighting and buoying of the Persian Gulf. The Committee concluded their labours the same year, and submitted alternative schemes, the less expensive of which would cost an initial outlay of £120,000, and an annual charge of £8,515. Neither Sir Edward Grey, nor Lord Morley were, however, prepared to agree to so expensive a scheme, the cost of which would be met equally by England and India ; and the former then suggested, as a preliminary to further measures in the future, that the two Governments should participate equally in acquiring, at an initial cost of £1,000, and an annual cost of £135, one beacon and fifteen buoys maintained by the British India Steam Navigation Company in the Persian Gulf. It is hoped by this measure to frustrate any other Power having vested interests in the better navigation of the Persian Gulf. Orders have now been issued to the Director, Royal Indian Marine, to take over and maintain the buoys and beacon.

(260) TRANSFER OF THE COAL DEPOT AT BUSHIRE TO KOWEIT.

The above is considered to be necessary on grounds of high policy and pending the consideration of the political questions involved, estimates are under preparation showing how the marine budget will be affected. These will shortly be placed before the Secretary of State.

(261) MARINE EXPENDITURE.

The following figures show the actual expenditure, Indian and Home, for marine purposes during the past five years :—

1905-06	...	... { Indian	...	... Rs. 21,05,683
		{ Home	...	... £ 277,805
1906-07	...	... { Indian	...	... Rs. 19,11,797
		{ Home	...	... £ 386,789
1907-08	...	... { Indian	...	... Rs. 22,80,776
		{ Home	...	... £ 245,286
1908-09	...	... { Indian	...	... Rs. 17,86,844
		{ Home	...	... £ 232,386
1909-10	...	... { Indian	...	... Rs. 25,20,712
		{ Home	...	... £ 188,167

A sum of Rs. 27,13,000 has been provided in the Indian estimates for 1910-11, and £ 228,800 in the Home estimates.

(262) SILTING OF APPROACHES TO THE BOMBAY DOCKYARD.

Owing to certain extensive works being carried out by the Bombay Port Trust, it was found in 1909 that very considerable silting was taking place at the entrance to the Royal Indian Marine Dockyard and Basin at Bombay. At first the Royal Indian Marine Dredger "Mud Turtle" was employed for the necessary dredging to keep the approaches clear; but as it broke down it became necessary early in 1910 to hire two steam hoppers from a private firm to do the work, at a cost of £200, per mensem, per hopper, *plus* cost of coal, crew, etc. As this arrangement is very expensive, the Director, Royal Indian Marine, suggested that two "dummy" hoppers—*i.e.*, large barges without engines to receive the mud which are then towed away to deposit it—should be built, one in England and one in India, at a cost of Rs. 46,000 each; the Mud Turtle continuing to do the dredging as soon as it is repaired. This proposal has been accepted by Government, and funds for one dummy hopper are being provided.

APPENDICES.

APPENDIX A.

RATES OF PAY OBTAINING IN THE INDIAN ARMY.

Body guards.

Ranks.	VICE-ROY'S.		BOMBAY (SILLADAR)		MADEAS.	
	Consolidated pay.	Batta (see paragraph 970)	Consolidated pay.	Body guard allowance (a)	Pay.	Batta.
Risaldar	Rs.	Rs. A.	Rs.	Rs.	Rs. A. P.	Rs. A. P.
Ressaidar	180	20 0	250	10	150 0 0	80 0 0
Jemadar	120	20 0	150	10	...	...
Dafadar	70	8 0	...	...	60 0 0	8 0 0
Farrier dafadar	29	5 0	41	10	24 0 0	5 0 0
Lance dafadar	...	...	...	...	24 0 0	5 0 0
Farrier	24	4 0	40	10	20 0 0	4 0 0
Farrier	Above 10 years' service. 19	1 8	...	...
	Under 10 years' service. 16		...	...
1st	...	...	43	20 10 4	4 10 10	
2nd	...	...	38	(b)		
Trumpeter	...	...	37	10	20 0 0	4 0 0
Sowar	Above 10 years' service. 19	1 8	38*	10	13 0 0	1 8 0
Sowar	Under 10 years' service. 16					
Salutri	...	5 0	...	...	...	...

* Dismounted sowars receive pay as follows :—Pay Rs. 13 per mensem, Bodyguard allowance Rs. 10 per mensem, and dismounted allowance Rs. 2 per mensem.

INDIAN CAVALRY A.

Ranks.	SILLADAR.		NON-SILLADAR, 26TH TO 28TH CAVALRY.	
	BENGAL AND PUNJAB.	BOMBAY.	Pay.	Batta.
	Consolidat- ed pay.	Consolidat- ed pay.		
	Rs. A.	Rs. A.	Rs. A. P.	Rs. A. P.
Risaldar-major	300 0	300 0	150 0 0
Risaldar	250 0	250 0	150 0 0
Ressaider	150 0	150 0	110 0 0
Jemadar	80 0	80 0	60 0 0
Farrier-major	45 0	*45 0	24 0 0
Dafadar	45 0	45 0	24 0 0
Farrier-dafadar	24 0 0
Lance dafadar	40 0	40 0	20 0 0
Salutri	†54 0	†54 0	...
Trumpeter	41 0	41 0	20 0 0
Farrier pupil	16 0 0
Sowar	34 0	34 0	13 0 0
Camel-sowar	34 0	34 0	13 0 0
Farrier	34 0	34 0	20 10 4
Ward orderly	16 6	16 6	13 0 0
Assistant salutri	34 0	34 0	...
Recruit	16 6	14 0	...

* Rs. 57 in the case of Farrier-majors appointed before the 10th October 1909.

† Rising to Rs. 70 by quadrennial increments of Rs. 4.

42ND DEOLI REGIMENT (CAVALRY)—

43RD ERINPURA REGIMENT (CAVALRY)—

Ranks.	Consolidated pay.					
	Rs. A.					
Risaldar	250 0
Jemadar	80 0
Dafadar	45 0
Trumpeter	41 0
Sowar	34 0
Camel sowar	34 0
Recruit	16 6
	Extra duty pay.					
Pay dafadar, one per half squadron	6 0

ADEN (SILLADAR) TROOP—

Ranks.	Consolidated pay.					
	Rs. A.					
Risaldar	250 0
Jemadar	80 0
Kot-dafadar	68 0
Pay-dafadar	68 0
Dafadar	53 0
Trumpeter	48 0
Farrier	48 0
Sowar	43 0
Jemadar } Arab guides	40 0
Sowar }	25 0

NOTE.—An allowance of Rs. 15 per mensem is given to any member of the troop to act as interpreter.

INDIAN SUBMARINE MINING CORPS—

Designation.	Pay.	Designation.	Pay.
	Rs.		Rs.
Syrang ...	... 32	Lascar, 1st class ...	... 22
Tindal ...	... 27	„ 2nd class ...	... 20
Engine-driver, 1st class	... 52	„ 3rd class ...	... 18
„ „ 2nd class	... 32	„ 4th class ...	... 16
Carpenter ...	... 27	Bugler ...	... 14
Blacksmith ...	... 27	Clerk ...	... 32
		Extra duty pay.	
Telegraph linesman ...	17—1—22	For the care of each fire engine in charge	... 2
„ „ ...	22—2—32		
„ „ ...	32—3—47		

NOTE.—Syrangs, tindals, mistris and lascars only receive batta when absent from their permanent stations on duty with the M. W. S., the rates admissible being 8 annas for each night they are absent if in receipt of pay over Rs. 25 per mensem, and 4 annas if in receipt of Rs. 25 or less.

INDIAN ARTILLERY—

	Ranks.				Pay.	Batta.
					Rs.	Rs. A.
Subadar-major 100	15 0
Subadar 100	
Jemadar 50	7 8
Pay Havildar 20	
Havildar 20	5 0
Naik 16	
Trumpeter and gunner 12	1 8
Ward-orderly (F. G. A.) 12	1 8
Havildar-major	} of drivers				21	
Havildar		...	...	...	... 18	5 0
Naik					... 16	
Driver 11	1 8
Salutri 24	5 0
Shoeing-smith 16	1 8
Ward-orderly 11	1 8

ARTILLERY DRIVER AND LASCAR, AND COAST DEFENCE ESTABLISHMENTS.

British Mountain Batteries.

	Ranks.				Pay.	Batta.
					Rs.	Rs. A.
Pay Havildar 20	5 0
Havildar* 18	5 0
Naik 16	5 0
Driver 11	1 8
Salutri 20	5 0
Shoeing smith 16	1 8

NOTE.—A pay-havildar on pay of rank with e. d. pay at Rs. 4 p. m., and an assistant pay-havildar with e. d. pay at Rs. 4 p. m., is allowed for each British Mountain Battery.

Heavy Batteries and partly horsed Heavy Batteries.

Havildar	...	...	...	...	... 16	5 0
„ partly horsed heavy batteries	...	...	...	...	... 18	5 0
Naik	...	...	...	...	... 13	5 0
„ horse draught partly horsed heavy batteries	...	...	...	...	... 16	5 0
Driver	...	...	...	...	... 10	1 0
„ horse draught partly horsed heavy batteries	...	...	...	...	... 11	1 8
Salutri	...	...	...	...	... 18	5 0

Horse, Field and Howitzer Batteries and Ammunition Columns.

Havildar* (howitzer batteries and all ammunition columns)	...	18	5	0
Naik	...	16	5	0
Driver or lascars	...	11	1	8
Salutri	...	20	5	0
Shoeing-smith	...	16	1	8

NOTE I.—N. C. Os. or drivers are allowed Rs. 4 p. m. each when absent from their own stations on duty with R. A. officers purchasing mules for mountain batteries.

NOTE II.—An Indian rough rider with e. d. p. of Rs. 2 p. m. is allowed to each R. H. A. and R. F. A. ammunition column.

Coast Defence Gunners.

Havildar	...	16	5	0
Naik	...	14	5	0
Gunner	...	9	1	8

Marine Lascars—Bombay Defence.

Tindal	...	22	0	0
Lascars	...	15	0	0

The N. C. O. appointed havildar-major in a British Mountain Battery or R. F. A. ammunition column will receive e. d. pay at Rs. 8 p. m.

SAPPERS AND MINERS.

	Ranks					Pay (a). Rs.	Batta. Rs.
	Subadar-major	Subadar	Jamadar	Havildar	Naik		
Subadar-major	100	{ 15
Subadar	100	(c) }
Jamadar	50	7½
Havildar	18	{ 5
Naik	16	
Bugler	...	{ ...	{ ...	{ ...	{ ...	11	1½
Trumper, sapper	...					11	
Artisan, Mily. Ry. Co.	11	
Ward orderly	8½	...
Recruit boy	...	{ 3rd S. and M.	{ ...	{ ...	{ ...	5	...
						4	
Pension boy	...	Ditto	...	...	...	18	{ 5
Havildar	...	{ ...	{ Driver establishment...	{ ...	{ ...	16	1½
Naik	...					11	
Driver	...						

INDIAN INFANTRY.

Ranks.	Infantry.			P.A. Corps of Guides Infantry.		
	Rs.	A.	P.	Rs.	A.	P.
Subadar-major	100	0	0
Subadar	100	0	0
Jemadar	50	0	0
Havildar	18	0	0
Naik	16	0	0
Drummer and bugler	11	0	0
Sepoy (<i>a</i>) and sepoy musician	11	0	0

NEPAL ESCORT.

	Rs.	A.	P.
Subadar
Jemadar
Havildar
Naik (Inf.)
Naik (Cav.)
Bugler
Sowar
Sepoy

APPENDIX B.

COMPOSITION OF THE BAZAAR VALLEY FIELD FORCE.

General Officer Commanding the Force.

Major General Sir James Willcocks, K.C.M.G., C.B., D.S.O.

1st Brigade. Brigadier General Anderson.

1st Battalion, Royal Warwicks.

53rd Sikhs.

59th Scinde Rifles.

2nd Battalion, 5th Gurkhas, (temporarily attached 2nd Brigade.)

2nd Brigade. Major-General Barrett.

1st Battalion, Seaforth Highlanders.

28th Punjabis.

45th Sikhs.

54th Sikhs.

3rd Brigade. Major-General Wathis, in reserve at Nowshera.

1st Battalion, Munster Fusiliers (Remained at Nowshera.)

23rd Peshawar Mountain Battery („ „ „ „)

1st Battalion, 5th Gurkhas (Retained at Feshawar .)

1st Battalion, 6th Gurkhas (Remained at Nowshera .)

55th Coke's Rifles.

25th Punjabis (Temporarily on L. of C.)

Divisional Troops.

2 squadrons 19th Lancers.

2 squadrons 37th Lancers. (Temporarily attached, 2nd Brigade.)

23rd Sikh Pioneers („ „ „ „ „ „)

25th Punjabis.

No. 3 Mountain Battery, Royal Garrison Artillery („ „ „ „ „ „)

4 guns 22nd Derajat Mountain Battery („ „ „ „ „ „)

No. 6 Company, 1st Sappers and Miners („ „ „ „ „ „)

3 Sections 9 Company, 2nd Sappers and Miners („ „ „ „ „ „)

No. 105 Native Field Hospital.

Attached 800 Khyber Rifles.

With the usual proportion of Transport, Field Hospitals, Supply Columns, attached to each Brigade, and to the Divisional Troops.

COMPOSITION OF THE MOKMAND FIELD FORCE.

Major-General Sir James Willcocks, K.C.M.G., C.B., D.S.O., Commanding the Force.

1st Brigade. Brigadier General O. A. Anderson, C. B.

1st Northumberland Fusiliers.

53rd Sikhs, Frontier Force.

57th Rifles, Frontier Force.

59th Rifles, Frontier Force.

2nd Brigade. Major-General A. A. Barrett, C. B.

1st Seaforth Highlanders.

Guides Infantry.

28th Punjabis.

55th Rifles, Frontier Force.

3rd (Reserve) Brigade. Brigadier-General J. G. Ramsay, C. B.

1st Munster Fusiliers.

21st Punjabis.

22nd Punjabis.

40th Pathans.

Divisional Troops.

21st Cavalry, Frontier Force.

No. 8 Mountain Battery, Royal Garrison Artillery.

23rd Mountain Battery.

28th Mountain Battery.

No. 1 Company, 1st Sappers and Miners.

No. 6 Company, 1st Sappers and Miners.

34th Pioneers.

With the usual proportion of Transport, Field Hospitals, Supply Columns attached to each Brigade and to the Divisional Troops.

COMPOSITION OF THE KHYBER FORCE, MAY 1908.

General Officer Commanding. Major General Sir James Willcocks, K.C.M.G., C.B., D.S.O.

3rd Reserve Brigade (from Mohmand Force) Commanded by Brigadier General Ramsay, C.B. with 4 guns, 80th Battery, Royal Field Artillery, 28th Mountain Battery, and 1 squadron 19th Lancers from Peshawar to Jamrud.

2 guns, 18th Battery, Royal Field Artillery from Shabkadar, and 23rd Mountain Battery, Seaforth Highlanders and Guides Infantry from Jangli Burj, under Major General Barrett, C. B. to Peshawar *en-route* for the Khyber.

54th Sikhs from Nowshera to Peshawar.

With the usual proportion of Transport, Field Hospitals, Supply Columns, etc.

INDEX.

A

	PAGE.
Accommodation for troops, increase due to redi-tribution scheme ...	83
Accountant, Royal Indian Marine Dockyard, Kidderpore ...	99—100
Accountant, Chief, Royal Indian Marine Dockyard, Bombay, appointment of ...	...
Accounts, Marine, introduction of a new system of ...	...
Acetone, manufacture ...	70
Acetone, recovery of—after use in manufacture of cordite ...	70
Aden Hinterland, withdrawal from ...	46
Aden Troop, reorganisation ...	16
Afghanistan, affairs in ...	61
Afghanistan, Amir of, visit to India, reviews, etc. ...	87
Ahmedabad Ordnance Depôt, gradual abolition ...	69
Ahmednagar Cantonment, piped water-supply ...	82
Ahmednagar, increased accommodation for troops, etc. ...	83
Ammunition, small arms, reserve of ...	24
Ammunition, Artillery, reserve of ...	25
Anglo-Russian Convention ...	27
Armament, withdrawal of the—from certain Royal Indian Marine ships ...	95
Armies, Northern and Southern, creation of ...	6
Armourers, Civil Chief, abolition ...	70
Arms traffic operations ...	37
Army Bearer Corps, reduction ...	75
Army Clothing Department, two additional officers for—sanctioned ...	89
Army Clothing Department, additional officer for ...	...
Army Clothing Factory, Fatehgarh, experimental establishment ...	...
Army Department, formation of ...	...
Army Reserve, Indian Section, regulations framed under the Reserve Forces Act for an.	89
Arsenals and Ordnance Depôts, redistribution of staff ...	...
Arsenal, Kirkee, construction of buildings ...	...
Arsenal, Bombay, gradual abolition ...	...
Arsenal, Mhow, gradual abolition ...	...
Arsenals, charge allowances of warrant officers ...	70

						PAGE.
Arsenals, extension	...	...	...	...	...	70
Arsenal, Kirkee, proposed formation	...	...	...	...	...	69
Arthur Bunder Coal Depôt, lease of	...	...	...	...	...	96
Artificers, Ordnance, formation of a corps of	...	...	...	...	...	69
Artillery Ammunition Columns	...	...	...	...	...	32
Artillery horses, reserve of	...	...	...	...	...	33
Artillery, Heavy, conversion of	...	...	...	...	...	32
Artillery, Mountain, trial of new types of guns and howitzers for				...	...	72
Artillery, Horse and Field, rearmament	...	...	...	...	...	24, 74
Artillery organisation	...	...	...	...	...	19
Artillery, R. G. A., reorganisation	...	...	...	...	...	19
Artillery, inland defences, replacement by more modern guns			...	...	...	74
Aruvankad Ordnance Factory, extension	...	...	...	...	...	70
Australian horse market, enquiry regarding resources	...	...	...	...	...	84
Australian mule market, enquiry regarding resources	...	...	...	...	...	84

B

Baghdad Railway	...	...	...	...	...	67
Bahrein Consulate, Construction of a launch for the			...	...	...	92
Baleli, Cavalry Brigade at	...	...	...	...	...	27
Baluchistan Infantry, delocalisation	...	...	...	...	...	15
Bannu, increase of garrison	...	...	...	...	...	45
Bastar State, disturbances in	...	...	...	...	...	42
Bazaar Valley Expedition	...	...	...	...	...	34
Bazar, Nowshera Cavalry Cantonment, acquisition of land			...	...	...	88
Bhopal Infantry, 9th, delocalisation of	...	...	...	...	...	14
Bombay arsenal, gradual abolition	...	...	...	...	...	69
Bombay, breakwater pier, reconstruction	...	...	...	...	...	80
Bombay, Gun Carriage Factory, closed	...	...	...	...	...	70
Bombay Ordnance Depôt, proposed formation	...	...	...	...	...	69
Bombay-Sind, broad gauge line	...	...	...	...	...	67
Breakwater pier, Bombay, reconstruction	...	...	...	...	...	80
Brigades, homogeneous and mixed	...	...	...	...	...	28
British India, Order of, increase to	...	...	...	...	...	13
British soldiers, invaliding to hills instead of to England			...	...	...	10

	PAGE.
Budget, Army	6
Budget estimates, Royal Indian Marine, revised procedure for making provision in—for wages of dockyard labourers and purchase of dockyard stores.	96
Burma Battalions, delocalisation of	15
Burma, withdrawal of a British Infantry Battalion from	48
Bushire, Coal Depôt, proposed transfer of—to Koweit	100

C

Camping ground, Nowshera Cavalry Cantonment, acquisition of land ...	88
“Cauning,” R. I. M. S., replacement and sale of	90
Cantonment Magistrates, appointment of Indian officers	88
Caps, “Brodrick,” Field Service, abolition	88
Caps, Field Service, re-adoption of Austrian pattern	88
Cavalry, rifle carrying equipment	21
Cavalry School, formation	20
Cawnpore Harness and Saddlery Factory, electrification and extension ...	72
Chemical Laboratory, Central, Naini Tal, for examination of cordite ...	71
Ceylon, despatch of Indian Infantry to	46
Chenab Canal Colony Remount Circle, formed	84
Chief Civil Engineer, appointment of—to Inspector General of Ordnance Factories.	3
Chief of the General Staff, creation of appointment	2
Chief of the Staff, creation of appointment	1
Christians, Indian, recruitment of	18
Chumbi Valley, withdrawal from	47
Civilian dentists, tentative employment	79
Clothing, cash allowance to British troops	9
Coal Depôt, Arthur Bunder, lease of	96
Coal Depôt, Bushire, proposed transfer of—to Koweit	100
Coast defences	30
Commanders-in-Chief, Naval, list of	90
Commands, abolition of	6
Concession to Indian Army on fiftieth anniversary of assumption of Government of India by Crown.	12
Concessions to Indian Army	11
Constructor, Royal Indian Marine Dockyard, Bombay, appointment of ...	94
Convalescent British soldiers, improved system of dieting and service of meals.	79

Conservancy, "wet" system, trial ...	...	...	...	...	76
Conservancy, dry earth system, abolition ...	...	...	...	...	77
Conservancy, "wet" system, introduction ..	...	...	...	...	77
Convention, Anglo-Russian ...	...	...	...	...	27
Cordite refrigerating plant, trial ...	...	...	...	...	73
Cordite cells in arsenals and at coast defences, refrigeration		...	...	...	73
Cordite, storage, recommendations of committee on ...	...	..	...	...	73
Cordite, examination at Central Chemical Laboratory, Naini Tal ...	...	...	...	...	71
Cordite, recovery of acetone used in manufacture ...	...	...	...	...	70
Cordite, storage and examination ...	...	...	...	...	71
Cossipore Ordnance Factory, extension ...	...	...	...	...	70
Cossipore Gun and Shell Factory, electrification	...	...	...	...	72

D

Darjeeling, location of Gurkhas at	...	..	...	...	49
Deesa, withdrawal of garrison	...	...	...	...	47
Defences, coast	...	...	...	...	30
Defences, inland	...	...	..	...	32
Defences, inland, modern guns for	...	...	...	...	74
Dehra Dun, X-ray Institute	...	...	...	...	75
Delocalisation of—					
9th Bhopal Infantry	...	...	...	...	14
Burma Battalions	...	...	...	...	15
124th and 126th Baluchistan Infantry	...	...	...	...	15
Detention allowance, Regimental Officers	...	...	...	...	8
Dieting and service of meals of convalescent British soldiers, improved arrangements.					79
Directors, Royal Indian Marine, list of ...	...	...	...	...	90
Distinguished service medal, institution of	...	...	...	...	13
Divisions of the Army Department, formation	...	...	...	...	1—3
Divisional Sanitary Officers, appointment ...	...	...	...	..	76
Dockyard, Royal Indian Marine, Bombay, measures taken in connection with the silting of the approaches to the.					101
Dockyards, Royal Indian Marine, private work allowed, under certain conditions, for Royal Navy and Royal Indian Marine officers.					96
Dockyards, Royal Indian Marine, prohibition of private work in				...	96
Dum Dum Ammunition Factory, electrification	~	...	...	...	72
Dum Dum Ordnance Factory, extension	...	...	...	...	70

E

Eastern Bengal and Assam, distribution of troops in	...	...	...	47
East Indies squadron, association of—with the Cape squadron	...	...	...	96
Electrical installations in barracks, etc.	...	...	...	10
Electrification, Ammunition Factory, Dum Dum	...	...	...	72
Electrification, Gun and Shell Factory, Cossipore	...	...	...	72
Electrification, Harness and Saddlery Factory, Cawnpore	...	...	...	72
"Elephanta," tug, construction of	...	...	...	91
"Elles, General," construction of launch ...	...	...	...	91
"Elphinstone," R. I. M. station vessel, replacement of—under consideration ..	...	...	...	91
Engineers, Royal Indian Marine, improvements in the pay and prospects of ...	...	...	...	95
Engineers, Royal Indian Marine, proposal to engage locally dropped	...	...	...	94
Enteric fever, decrease in the Army	...	...	...	77
Enteric fever, dépôt for convalescents opened at Wellington	...	...	...	76
Enteric fever, measures for prevention	...	...	...	76
Entrenching tools, provision of	...	...	...	26
Equipment for carrying machine guns	...	...	...	21
Equipment, ordnance, revised procedure for supply to units	...	...	...	74
Equipment, rifle carrying, for Cavalry	...	...	...	21
Examiner, Marine Accounts, abolition of the appointment of	...	...	...	99—100
Expenditure, Army	7
Expenditure, Royal Indian Marine, figures showing—during 1905-06 to 1909-10				101	

F

Farms, incorporation of—into administration of Supply and Transport Corps	...	...	...	5
Fatehgarh Army Clothing Factory, experimental establishment	...	...	...	88
Flyproof wire gauze doors, etc., provision for dining rooms, kitchens, etc., in Baluchistan.				77
"Fraser, Lady," construction of vessel named	...	...	...	91
Furlough to British soldiers	...	...	...	9

G

Garhwal Brigade, division of—into two	...	...	...	...	6
"General Elles," R. I. M. launch, construction of the—for the use of the Royal Garrison Artillery at Rangoon.					91
General Staff, creation of	...	...	...	...	6
Government flotilla for the Irrawaddy, reduction of	...	...	...	...	92
Grass farms, Nowshera Cavalry Cantonment, acquisition of land					88

Gratuities, war, granted to the Bazaar Valley and Mohmand Field Forces	...	...	...	...	85
Gumal bridge at Murtaza	...	...	...	...	66
Gun Carriage Factory, Bombay, closed	...	...	...	...	70
Gun Carriage Factory, Central, Jubbulpore, completion	...	...	...	...	83
Gun Carriage Factory, Madras, closed	...	...	...	...	70
Gun cotton, manufacture by "displacement" process	...	...	...	...	72
Guns, manufacture in India	...	...	...	...	71
Gurkhas, 2-7th, raising of	...	...	...	...	14
Gurkhas, 2-10th, raising of	...	...	...	...	14
Gurkhas, location of 2 Battalions of—at Darjeeling	...	...	...	...	49
Gurkhas, recruitment of—for police	...	...	...	...	17
Gurkha reserve, formation	...	...	...	...	17
Gyantse relief force	...	...	...	...	42

H

'Hardinge,' R. I. M. S., employed for the conveyance of the Duke and Duchess of Connaught.	...	...	...	...	95
Harness and Saddlery Factory, Cawnpore, electrification and extension	...	...	...	...	72
Health efficiency of troops, appointment of a travelling Inspector and lecturer on	...	...	...	...	76
Health statistics, 1909-10	...	...	...	...	77
Heavy batteries, conversion into fully horsed	...	...	...	...	32
Helmets, British troops, supply of improved patterns	...	...	...	...	88
Hkampti Long Expedition	...	...	...	...	44
Hoppers, steam, hire of two—in connection with the silting of the approaches to the Royal Indian Marine Dockyard, Bombay.	...	...	...	...	101
Horses, Artillery, reserve of	...	...	...	...	33
Horses, Australian, grant of bonus to shippers	...	...	...	...	84
Horse market, Australia, enquiry regarding resources	...	...	...	...	84
Horses suitable for the Army available on mobilisation, census	...	...	...	...	84
Hospital Assistants, Civil, improvements in conditions of service	...	...	...	...	12
Hospital Assistants, Military, conditions of service	...	...	...	...	10
Hospitals, Field, medical and surgical equipment for	...	...	...	...	26
Hospitals, General and Field, additional	...	...	...	...	27
Hospitals, Military, microscopes for	...	...	...	...	76
Hospital, Veterinary, Nowshe-a Cavalry Cantonment, acquisition of land	...	...	...	...	88
Hutting, Indian troops, improved type	...	...	...	...	83

I

	PAGE.
Imperial Service Troops	19
Indian Army Bill, introduction of a new	89
Indian Army, concessions to	11
Indian Army, concessions to—on fiftieth anniversary of assumption of Government of India by Crown.	12
Indian Medical Service, allotment of civil areas for offices	75
Indian Medical Service, delocalisation	75
Indian Medical Service, recruitment estimates	78
Indian Medical Service, unification of—for military employment	75
Indian Ordnance Artificers, corps of	69
Infantry, Indian, addition of 1,496 men	16
Inspectors of Army Schools, increase of pay	8
Inspector-General of Ordnance Factories, appointment of	3
Inspector-General of Ordnance Factories, increased office establishment ...	72
Internal defence	32
Invaliding of British soldiers to hills	10
Invalids, trooping arrangements for, committee on	76
“Investigator,” R.I.M.S., construction of—to replace the old “Investigator,” which was sold.	90
“Irrawaddy,” R.I.M.S., sale of	92
Ishapore Ordnance Factory, extension	70

J

Jacobabad, withdrawal of Cavalry from	50
Jemadar, grant of honorary rank to certain ranks	12
Jhelum Canal Colony Remount Circle, transfer of head-quarters to Sargodha ...	84
Jubbulpore, Central Gun Carriage Factory, completion	83
Jubbulpore, increased accommodation for troops, etc.	83
Judge Advocate-General's Department, reorganisation	5

K

Kacha Garhi, base at	28
Khushalgarh bridge	66
Khyber, operations in	36
Khyber road	66
Kirkee Arsenal, construction of buildings	81
Kirkee Ordnance Factory, extension	70

	PAGE.
Kirkee Arsenal, proposed formation	69
Knee boots, re-introduction of—for Royal Horse Artillery	89
Kohat, base at	28
Kowait Agency, construction of a launch for the	92
Kowait, transfer of Bushire coal depot to	100
Kurram road | ... ... ... ...	68
L	
Laboratories, Brigade, all Divisional and Brigade headquarters provided with ...	77
Laboratories, Brigade, establishment	76
Laboratories, clinical, at Divisional and Brigade headquarters, additional apparatus for.	76
"Lady Fraser," Bengal Pilot Service vessel, construction of	91
Lakki, affair at	43
Land acquisition, Nowshera Cavalry Cantonment, for rifle ranges, grass farm, etc.	88
Languages, Arabic, interpreters' test	85
Languages, Hindustani, revision of test	85
Languages, Russian, new rules for examination	85
Lascars, Ordnance, position	70
Laundry clothes, provision of storage	79
Local allowance, grant of—to Royal Indian Marine officers holding shore appointments in Burma.	95
Local Governments, increased powers delegated to—as regards the disposal of vessels.	96
Loi Shilman Railway	68
M	
Machine guns, equipment for carrying	21
Madras Brigade, amalgamation with Southern Brigade	6
Madras, Gun Carriage Factory, closed	70
Mahsuds, recruitment of	18
Malarious places, mosquito curtains for British troops at	76
Malwa Bhil Corps, conversion to police	15
Mandi State, rising in	42
Marine Survey of India, appointment of a Royal Indian Marine officer as Surveyor in charge.	94—95
Mauritius, withdrawal of Indian Infantry... ...	46
Maxim guns, provision of	25

	PAGE
Maymyo, increased accommodation for troops	83
Medal, distinguished service, institution of	13
Medals, I. G. S., 1908	85
Medical and sanitary	75
Medical and sanitary measures under consideration	79
Medical Store Department, proposed reorganisation	78
Medical subordinates, increased allowance ..	12
Mengal affairs ...	43
Meywar Bhil Corps, conversion to police ...	15
Mhow Arsenal, gradual abolition	69
Military Works ...	80
Military Works expenditure, quinquennial statement	89
Mirpur stud, abolition	84
Microscopes for Military Hospitals	76
Military Department, abolition of	1
Military Finance Branch, formation of ...	1
Military Supply Department, abolition of	2
Military Supply Department, formation of	1
Miscellaneous ...	85
Mohammerah Consulate, construction of a launch for the	92
Mohmand Expedition ...	85
Monoculars, provision of ...	26
Moplahs, 77th and 78th, disbandment	14
Mosquito curtains, grants-in-aid to British regiments for provision	79
Mosquito curtains issued to British troops at malarious stations	76
Mosquito nets, provision for patients in hospitals for Indian troops	79
Mules, equipment, for Pioneers	26
Mules, machine gun	21
Mule market, Australia, enquiry regarding resources	84
Mule market, New Zealand, enquiry regarding resources	84
Musketry courses, Indian, assimilation with home courses	86

N

"Nancowry," R.I.M.S., replacement of ...	90
Native languages, study of—by Europeans in Ordnance Department	69
Naval Basin, Bombay, question of formation of—dropped	96

Naval storage, Bombay, contribution paid by the Admiralty for	...	...	...	...	96—97
Nepal Durbar, supply of rifles	...	...	...	...	88
Nepal, Lord Kitchener's visit to	...	...	...	...	87
New Zealand horse market, enquiry regarding resources		...	...	...	84
New Zealand mule market, enquiry regarding resources		...	...	...	84
"Northbrook," R.I.M.S., construction of—to replace the "Canning"		...	...	...	90
Non-commissioned ranks, assimilation of—in Cavalry	...	...	...	...	18
North-Eastern Frontier, communications	...	...	...	...	67
North-West Frontier, situation on	...	...	...	...	51
Nowshera Cavalry Cantonment, land acquisition for rifle ranges, grass farm, etc.		...	...	...	83
Nowshera Cavalry Cantonment, increased accommodation for troops		...	...	...	83
Nowshera, increased accommodation for troops	...	...	...	...	83

O

Officers British, increase of	...	...	...	...	14
Officers, British, increase of pay	...	...	...	...	8
Officers, Indian, appointment as Cantonment Magistrates		...	...	...	83
Officers, interchange of—with Australia and Canada	...	...	...	...	83
Officers on leave, attachment to their units in England		...	...	...	83
Officers, Unattached List, allowance	...	...	...	...	8
Operating rooms, provision	...	...	...	...	75
Ordnance Department	...	...	...	...	69
Ordnance Department, reorganisation of	...	...	...	...	3—4
Ordnance Depôt, Ahmedabad, gradual abolition	...	...	...	...	69
Ordnance Depôt, Bombay, proposed formation	...	...	...	...	69
Ordnance Depôt, Poona, gradual abolition	...	...	...	...	69
Ordnance Depôt, Timulgherry, gradual abolition	...	...	...	...	69
Ordnance equipment, revised procedure for supply to units		...	...	...	74
Ordnance Factories, accounts of	...	...	...	...	4
Ordnance Factories and Arsenals, buildings constructed		...	...	...	81
Ordnance Factories, extension	...	...	...	...	70
Ordnance Field Parks	...	...	...	...	24
Ordnance Lascars, position	...	...	...	...	70

P

"Palinurus," R.I.M.S., construction of—to replace the "Nancowry"	...	90
--	-----	----

	PAGE.
Parks, Ordnance, Field	24
Pay, British officers, increase	8
Pay, Indian Army ... ... ... ...	... 11, 12, Appendix A.
Pay, Staff, Assistant Adjutant and Quarter Master General's	8
Pension boys, abolition of	18
Pensions, Indian Army, revised	11
Pensions, officers of Indian Army	9
Perambur Harness and Saddlery Workshops, closed	70
Persia, affairs in	62
Persia, military action in	34
Persian Government, construction of five launches for the	91
Persian Gulf, lighting and buoying of	100
Peshawar, affair near	43
Physical training, introduction of the Home System	86
Pienma Expedition	44
Pilot Service, Bengal, construction of the "Lady Fraser" for the	91
Pioneers, 107th, 121st, 128th, reconstitution of	16
Piped water-supply, Ahmednagar Cantonment	82
Piped water-supply, other stations	82
Poona Ordnance Depôt, gradual abolition	69
Prince and Princess of Wales, Their Royal Highnesses, visit to India, reviews, etc.	86
Professional Staff, Royal Indian Marine Dockyards, and precedence changes in designation of.	94
Proportion of British to Native troops	21

O.

Queen Alexandra's Military Nursing Service for India, regulations for admission altered.	76
Quetta, increased accommodation for troops	83

R.

Railway station, Nowshera Cavalry Cantonment, acquisition of land ...	88
Rajkot, addition to garrison	47
Ranges, rifle, Nowshera Cavalry Cantonment, acquisition of land ..	88
Rations, Admiralty scale, adoption of—on Royal Indian Marine vessels carrying British troops.	96
Recruit and pension boys, abolition of	18

	PAGE.
Recruiting Officer for Madrassi Hindus and Christians, abolition of	... 18
Recruitment—	
In Rajputana and Central India	... 18
Of Mahsuds	... 18
Indian Christians	... 18
Gurkhas	... 17
Re-distribution Scheme, increased accommodation due to	... 83
Reinforcements, despatch to India	... 23
Remount Department	... 84
Remount Depôt, Sargodha, completion of buildings	... 83
Reserve Forces Act, regulations framed under the—for an Indian Section of the Army Reserve.	89
Reserve, Gurkha, formation	... 17
Reserves, Indian Army, increase to	... 33
Reservists leaving India	... 17
Riding School, Nowshera Cavalry Cantonment, acquisition of land	... 88
Rifles for Nepal Durbar, supply	... 88
Rifles, reserve of	... 24
Rifles, reserve	... 74
Rifles, short and charger loading, supply	... 74
Robat, Garrison of	... 45
"Rosamond," construction of the—to replace the old "Rosamond" belonging to the Port Blair Administration.	91
Royal Army Medical Corps, adoption of English rates of pay	... 76
Royal Indian Marine Dockyard, Bombay, appointment of a constructor for	... 94
Royal Indian Marine Dockyards, changes in designation and precedence of the professional staff of.	94
Royal Indian Marine, reduction of—question dropped	... 98—99
Royal Indian Marine expenditure, figures showing—during 1905-06 to 1909-10	101
Royal Indian Marine shore appointments, list of additional—reserved for Royal Indian Marine officers.	93—94
Royal Indian Marine port appointments, list of additional—reserved for officers of the Royal Indian Marine.	93—94
Russia in Asia, affairs in	... 55
Russian, Anglo, Convention	... 27
 S.	
"Sakka II," R. I. M. launch, construction of — to replace the "Sakka"	... 90

	PAGE.
Sanitary officers, appointment of—in peace and war ...	... 76
Sanitary officers for field service, proposed appointment	... 76
Sanitation, instruction of officers and men in	... 75
Sargodha Remount Depôt, completion of buildings ...	... 83
Sargodha, head-quarters of Jhelum Canal Colony Remount Circle	... 84
Sargodha Remount Depôt and horse-run establishment	... 84
School, Cavalry, formation ... ... ...	... 20
Schools, Army, increase of pay to Inspectors	... 8
Secretary, Military Finance Branch, appointment of—as Joint Secretary, Army Department.	2
Shahjahanpur, withdrawal of troops ... ... ...	... 48
Shippers of Australian horses, bonus for loss on account of foals lost	... 84
Ships of war, Foreign, entertainment of officers and men of	... 95
Shoeing, cold, introduction ... ... ...	... 21
Shoemakers, Sergeant Master, training of	... 89
Signal Companies, organisation	... 29
Signalling, visual ... ... ...	... 30
Silladar Cavalry, transport ... ... ...	... 32
Small arms ammunition, storage	... 71
Small arms, maintenance in regiments	... 20
Somaliland ... ... ...	... 36
Southern Brigade, amalgamation with Madras Brigade	... 6
Specialists in Military Medical Science, revised rules for pay and appointment ...	76
Staff Officers, Senior, Annual Conferences	... 85
Staff Salary, Assistant Adjutant and Quarter Master Generals	... 8
Station Family Hospitals, Committee on improvement	... 76
Station Hospitals for Indian troops, proposed establishment	... 79
Station Hospitals, improvement in cooking	... 79
Stretcher pillow, newly invented, adoption	... 79
Station vessels, Royal Indian Marine, number of	... 97
Stud, Mirpur, abolition ... ... ...	... 84
Submarine Mining Flotilla, disposal of—on the abolition of the minefields	... 93
Subsistence allowance, grant of—to Royal Indian Marine Engineer officers who obtain Board of Trade certificates as Engineer and Shipwright Surveyor.	95
Supply and Transport Corps, reunification of	... 5
Surveyor-in-Charge, Marine Survey of India, appointment of a Royal Indian Marine officer as.	94—95

T

	PAGE.
Tangi, raid on village of	34
Telephone equipment for Field Army	30
Telescopes, provision of	26
Tibet, military intelligence	62
Tibet, operations in	42
Torpedo flotilla, Bombay, abolition of	93
Transport personnel, increased pay to	13
Travelling allowance, grant of—to Royal Indian Marine Engineers who obtain Board of Trade certificates as Engineer and Shipwright Surveyor.	95

Trimulgherry Ordnance Depôt, gradual abolition	69
Trooping arrangements for invalids, committee on	76
Turkey in Asia, affairs in	60

U

Unattached List officers, allowance	8
---	---

V

Venereal disease, appointment of a Royal Army Medical Corps officer on special duty for treatment of.	75
Venereal disease, decrease in the Army	77
Venereal statistics, 1909-10	77
Venereal disease, scheme for systematising routine in treatment	79
Vessels, building of large, scheme for the—in Royal Indian Marine Dockyards	97—98
Vessels, disposal of, increased powers delegated to Local Governments in respect of.	96
Vessels, R.I.M., employment of—on Home Trooping	99
Veterinary Hospital, Nowshera Cavalry Cantonment, acquisition of land for...	88
Visit to India, Their Royal Highnesses the Prince and Princess of Wales' ...	86
Visit to India, Amir of Afghanistan's	87
Visit to Nepal, Lord Kitchener's	87

W

Warrant Officers in arsenals, charge allowances	70
Water, drinking, purification	76
Wellaung Expedition	84
Wireless telegraphy	67
Workshops, Harness and Saddlery, Perambur, closed	70

X

X-ray apparatus, provision of	...	...	...	...	...	28
X-rays, instructions in	...	...	...	...	...	75

Y

Yachumi Expedition	...	...	...	...	...	34
Yun-nan, military intelligence	...	...	...	...	...	64

PRESIDENT'S
SECRETARIAT

LIBRARY

